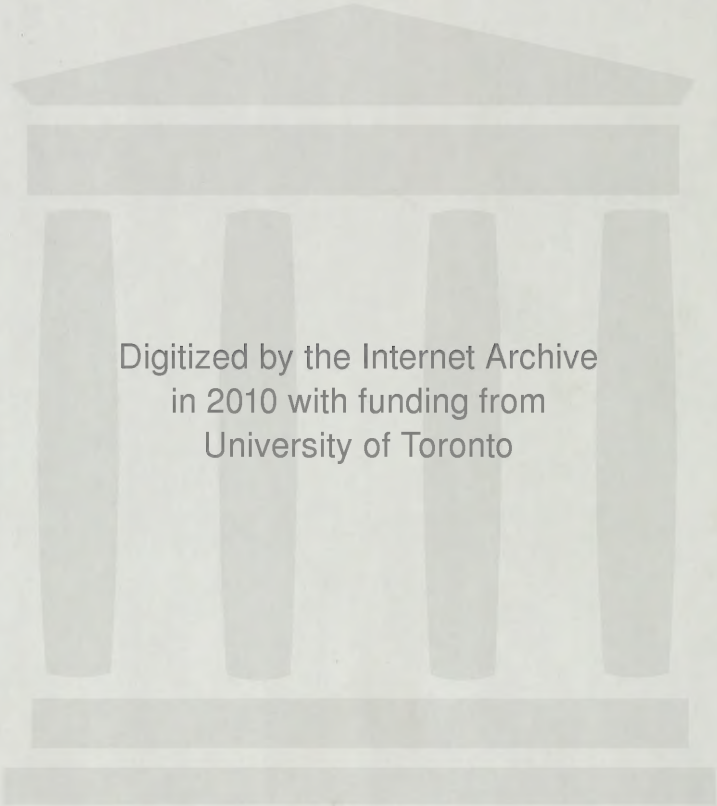
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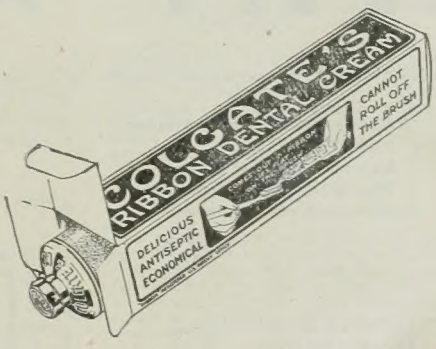

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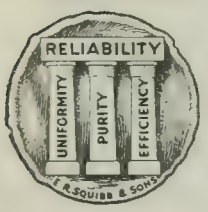

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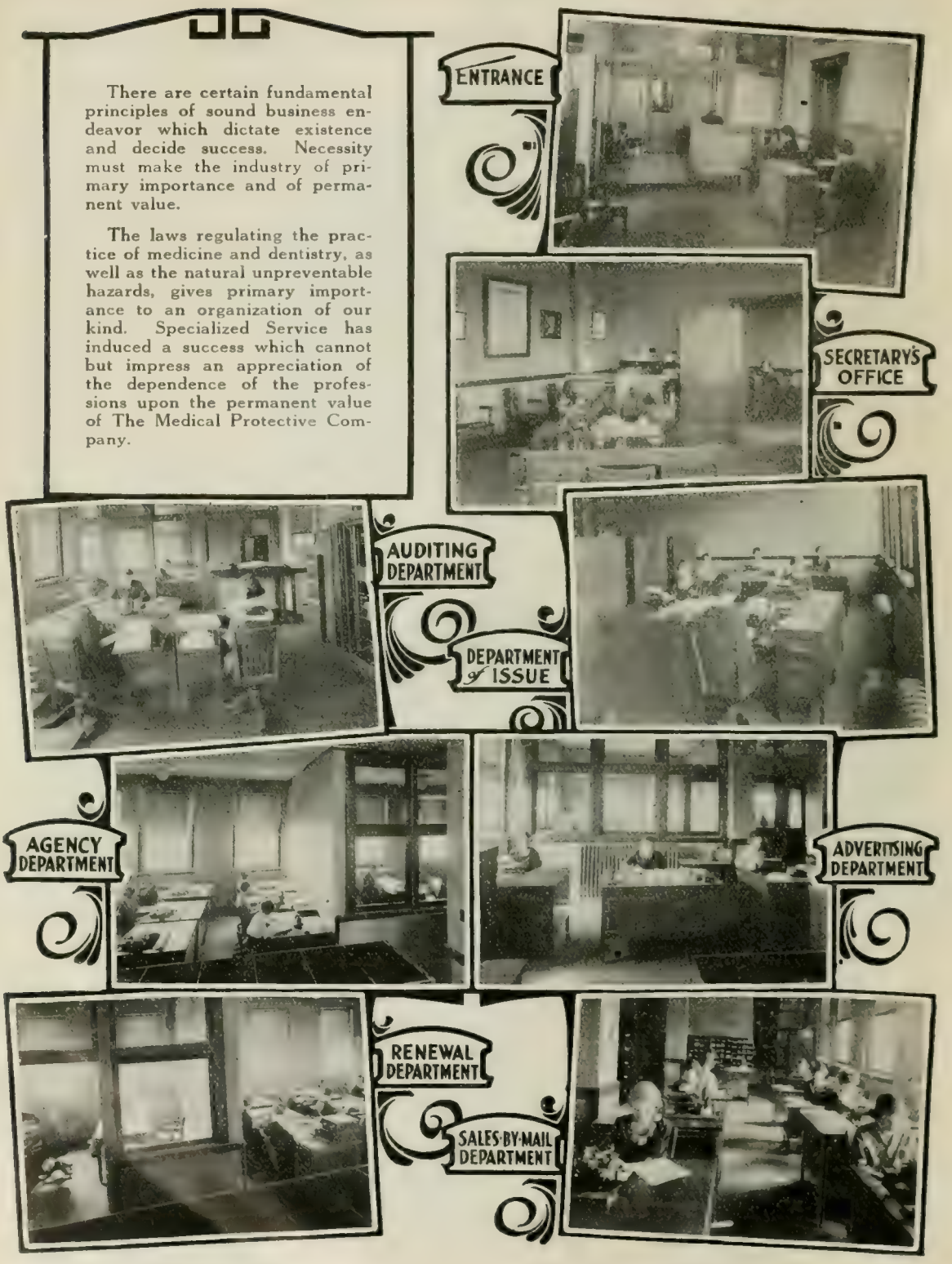

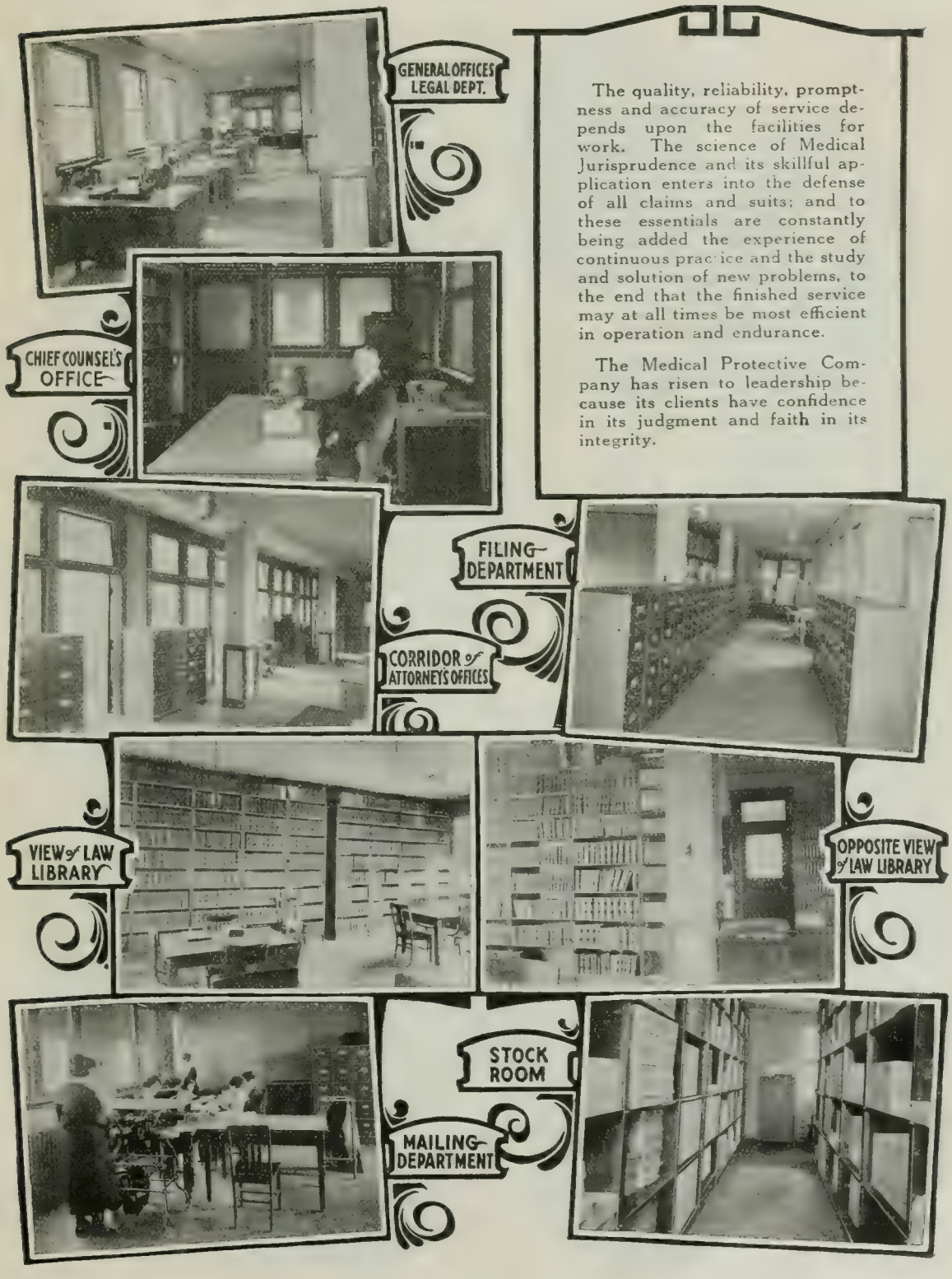

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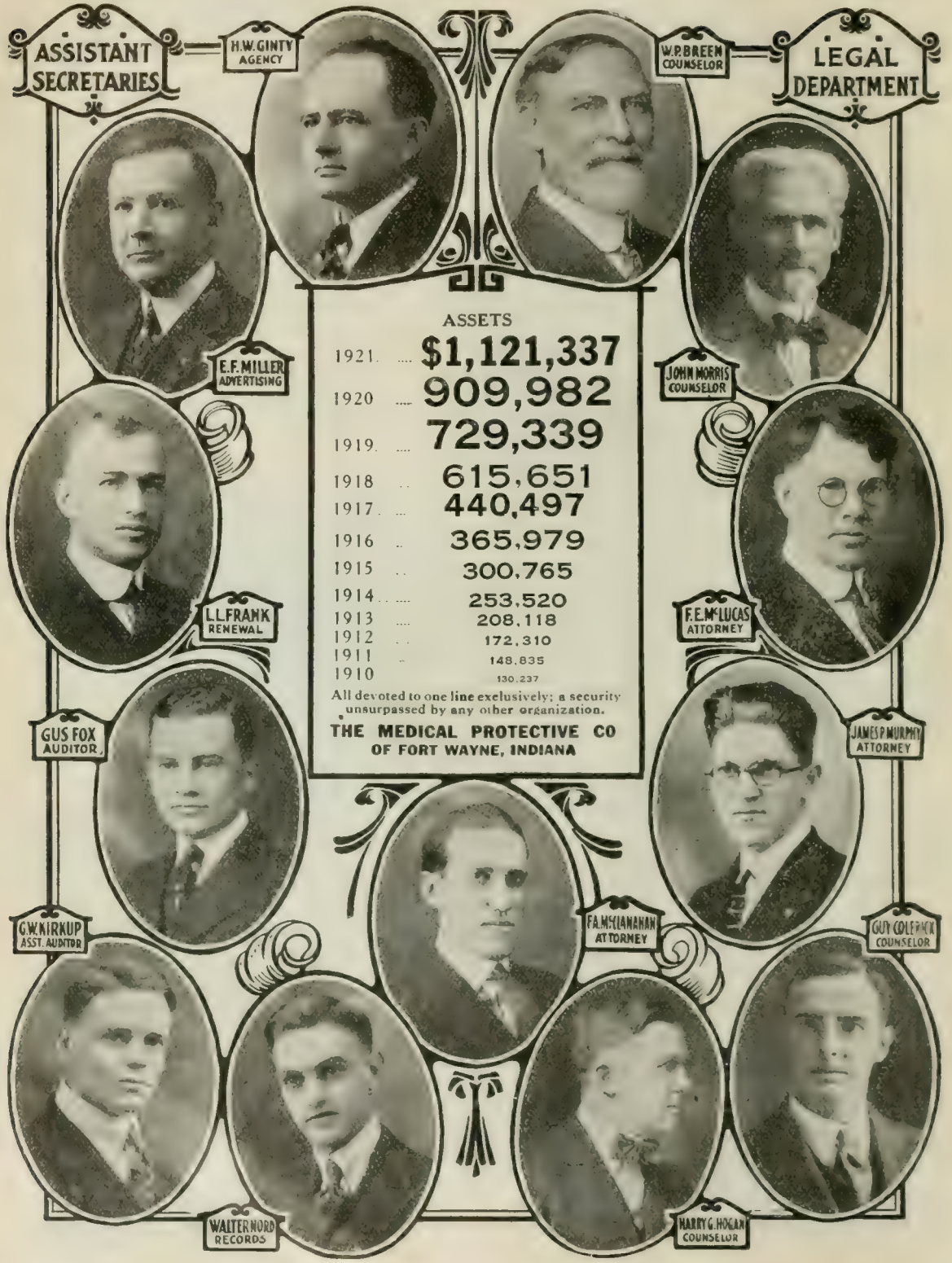
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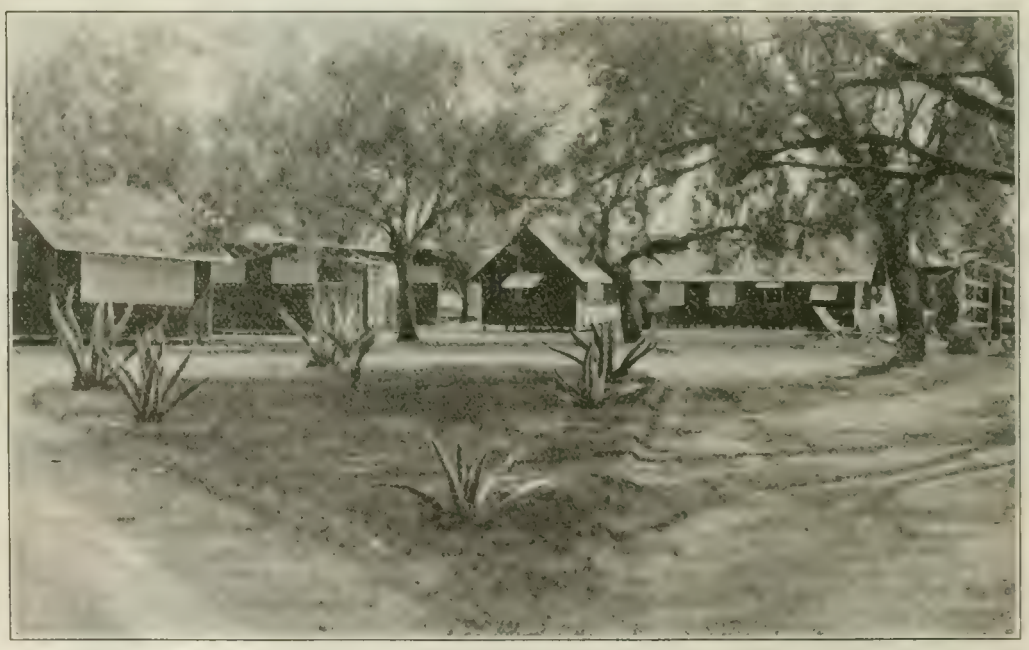

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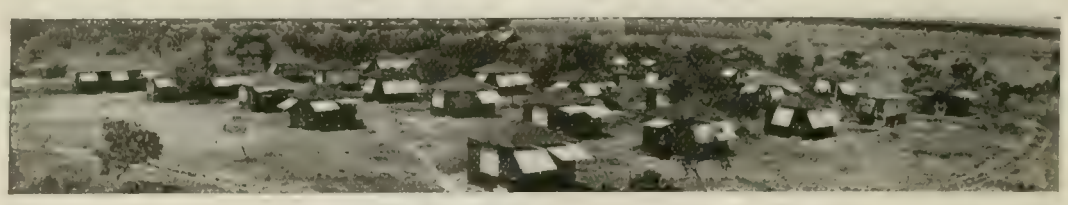

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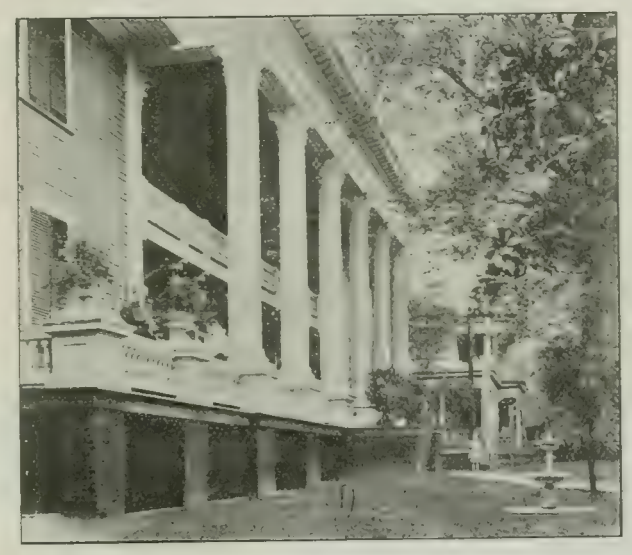

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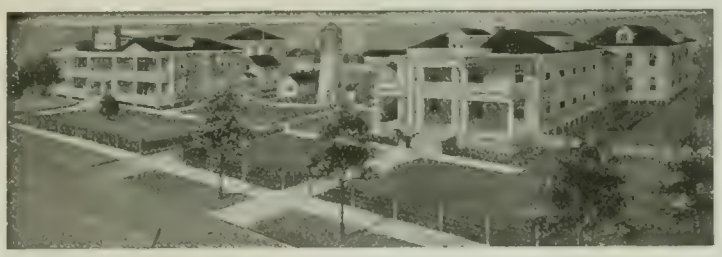

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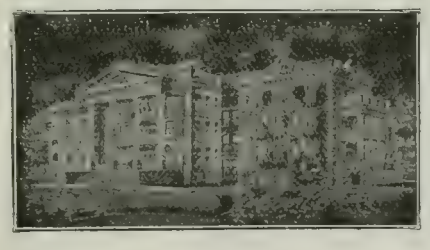

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JOURNAL OF THE SOUTHERN MEDICAL ASSOCIATION

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MEDICINE

INTERNAL DISEASES, PEDIATRICS, NEUROLOGY, DIAGNOSTIC METHODS, ETC.

SOUTHERN PEDIATRICS — RETROSPECTIVE AND PROSPECTIVE*

BY W. A. MULHERIN, A.M., M.D.,
Associate Professor of Pediatrics, University of Georgia; Pediatrician to Children's Hospital, University Hospital,
Augusta, Ga.

This meeting represents the fifth anniversary of the birth of the Pediatric Section of the Southern Medical Association. It is only our fourth meeting. In 1918 the Southern Medical Association held no meeting, owing to the influenza pandemic.

It occurred to me a retrospective and prospective view of our Section's activities might prove of interest and benefit to the members of this Section. I believe an inventory taken of assets and liabilities at this stage in our development will be of value to this Section. Such an inventory—if it might be called by that name—should be an impartial one. It should take into consideration our rapid and solid growth; forcibly stress the importance of proper and perfect organization; sincerely call attention to our liabilities as regards the far-reaching responsibilities resting on this Section's shoulders; and if facts warrant it, encourage us to look into the future boldly and determinedly, where large opportunities and fertile fields await us.

*Chairman's Address, Section on Pediatrics, Southern Medical Association, Fifteenth Annual Meeting, Hot Springs, Ark., Nov. 14-17, 1921.

HISTORY AND GROWTH

Prior to 1916 pediatrics in the South was practically unorganized. There was a small number of physicians devoting their entire time and attention to pediatrics. There was no definite, concerted action amongst them, with "Better Pediatrics in the South" as their slogan and final goal. The scientific program of the Southern Medical Association included pediatric deliberations in the program on internal medicine. There were no state pediatric societies—no definite organizations existing in our Southern states.

At the meeting of the Southern Medical Association in Atlanta, in 1916, the idea of organizing a pediatric section was conceived. A few of the Southern pediatrists approached the officers of the Southern Medical Association, asking that they be allowed to organize a pediatric section. Permission was granted, with doubts existing in the minds of some of the councilors as to the wisdom of their action. It was thought there was not a sufficient number of pediatrists in the South, or sufficient interest displayed in this particular branch of medicine in our Southern states, to warrant the creation of a pediatric section. However, permission was given for a half-day pediatric program to be "run off" on Monday afternoon, the day preceding the regular scientific session of the Southern Medical Association.

Organization of the Section on Pediatrics was perfected at the close of the Atlanta meeting. At this organization meeting it was quite apparent to any close

observer that success would crown the efforts and aspirations of the newly formed Section on Pediatrics. There existed at that meeting optimism linked with cool deliberation, grit and determination associated with full realization of the responsibilities and the far-reaching ill or good effects of the Section's activities in our Southern states.

MEMPHIS MEETING, 1917

This meeting being our first, might be truly designated as the representation of our birth as a Section. No difficult labor, as anticipated by a few of our friends, attended our birth. The birth was a perfectly natural one and revealed to those interested in us that vigorousness, determination and high ideals were our inherent qualities. These qualities have plainly manifested themselves in our subsequent growth.

Our Memphis meeting, with a time limit permitting only one afternoon session, was a brilliant success. It surpassed the fondest hopes and expectations of the then small number of section members—excellent papers, free and enlightening discussions, commendable enthusiasm, with an attendance that overtaxed the small convention room assigned us, were the outstanding features. Drs. John Lovett Morse, Boston, Mass., and Franklin P. Gengenback, Denver, Colo., were our honor guests and substantially contributed to the excellent papers and discussions, and to the success of our meeting. To these two generous and eminent pediatrists our Section should, and will, forever feel grateful.

With success written clearly across our transactions, and stimulated by the thought and satisfaction of having well done our work, the Section again asked the officers of the Southern Medical Association to grant us more time for our Section meetings. It was decided by the councilors that a full day session, morning and afternoon, might be granted us; this Section meeting likewise to be held on the day preceding the scientific session of the Southern Medical Association.

ASHEVILLE MEETING, 1919

(Owing to the influenza pandemic no meeting of the Southern Medical Association was held in 1918.) The American Child Hygiene Association kindly joined us in a joint meeting. The Section on Pediatrics' program was presented on Monday, the day preceding the Southern Medical Association's regular scientific program. A morning and afternoon session was held. The Child Hygiene Association's program occupied the following days. The assistance of the American Child Hygiene Association proved of inestimable value to us in stimulating and enthusing the members of our Section to greater things. The thanks and kind remembrance of our Section are truly due this Association. The Asheville meeting far excelled the Memphis meeting in its attendance of Southern pediatrists, scope of program, character of papers read, discussions, enthusiasm and determination of the members of the Section to expand the influence and activities of our Section.

At this stage of our development the Southern Medical Association, upon request, granted us the rights and privileges of a full-time section. The councilors were fully convinced that the healthy and shouting offspring of the Southern Medical Association was fully capable of creditably taking care of itself.

The Section on Pediatrics had by this time grown more pretentious, feeling sure of its strength and ability to put over an excellent three days' program at our next meeting in Louisville, Ky.

LOUISVILLE MEETING, 1920

The result of our healthy and steady growth was plainly evident at our Louisville meeting. The Section put on a full day of excellent clinics and three full scientific days. Our Section meeting was well attended and presented as strong and scientific a program, with as intelligent discussions, as any section of the Southern Medical Association. It was said by some of the general practitioner members of the Association attending the Louisville meeting that the Section on Pediatrics was the "live wire" of the Southern Medical Association. It occurred to me at the time of these remarks that there was more truth than untruth in the assertions. Dr. Charles Gilmore Kerley, New York, N. Y., was our

honor guest at this meeting, and helped in no little measure to make our meeting a decided success.

As we look back upon our four years of effective work, every member of this Section might justly feel proud of our activities and growth. I can truthfully say I know of no medical organization that has grown so steadily, persistently and enthusiastically in so short a time as this Section has done. According to the last directory of the American Medical Association, 1921, there are 673 Southern physicians specializing in pediatrics. I will venture to say that five years ago there was not one-fifth of that number devoting their time and attention to pediatrics. To the excellent corps of officers preceding me in office, who have so efficiently managed and developed this Section, and to each and every member of this Section, special credit is due for the good results accomplished.

It might rightly be said, as regards the life and growth of our Section, it was conceived in Atlanta, born in Memphis, cut its first teeth in Asheville, and reached healthy and substantial childhood in Louisville. If we carry our simile further, it might be said our Section has only reached adolescence in its development. Is it not a gratifying and pleasing thought for the members of this Section to deliberate upon the wonderful possibilities the future holds in store for our Section? When one thinks of the high-class and effective scientific work, the far-reaching and excellent results that will be forthcoming when this Section will have reached well developed and vigorous manhood, it might be truthfully stated the future looks especially rosy and promising, and invitingly beckons us onward.

ORGANIZATION

Let us not, in our successful accomplishments to date, make the fatal mistake of being self-satisfied. Today the man or organization who does not progress, *ipso facto*, falls behind in the game. The most important factor, as I see it, in the future progress and success of our Section lies in perfecting the organization. The major part of our work has just begun, for we have now reached that point in our development and growth where greater things are expected of us; and for the same reason more weighty responsibilities naturally will fall upon us. The spirit and determination are with us, but more perfect organization is the one way of meeting the new issues that will necessarily arise.

All big industrial, financial and medical successes in the world today, upon analysis, will show perfect organization to be the prerequisite of their success. The organization of our Section has developed along sane and practical lines, its foundation is solid, because it has been laid on such durable principles as a spirit of fairness to all, sincere interest in the Section's activities, hearty co-operation of all members, high ideals and commendable determination to have better pediatrics practiced in the South.

Apropos of the subject of organization, let me remind you of the decision reached by members of this Section at its Asheville meeting, 1919. It was decided that as our Section was the acknowledged mouthpiece of Southern pediatrics, and as it represented the best to be had in Southern pediatrics, it was plainly our duty to develop and elevate pediatric practice to higher standards throughout our entire Southern states. In keeping with this idea, it was outlined that we could best accomplish our purpose by directing our efforts along two lines:

1. To get every Southern pediatrist to join our Section as an active and interested member. Also to give special attention to strengthening our program each year along clinical and scientific lines for the purpose of making better Southern pediatrists. This we are fairly well accomplishing, for the vast majority of the 673 Southern pediatricians are members of our Section. Likewise, our programs are steadily improving each year in their clinical and scientific aspect.

2. To reach the general practitioners of the South, who naturally treat more babies than the pediatrists, and endeavor to create more interest and study in pediatrics. Also, to devise some method of informing them on current pediatric topics for the purpose of elevating their grade of pediatric practice. To accomplish this it was

decided to organize in each Southern state a state pediatric society as a component part of each Southern state medical association. By this procedure members of our Section, as members of the state pediatric society, could bring before their respective state medical associations timely, broad-gauged pediatric subjects that would be welcomed and especially helpful to the general practitioners. As a result better pediatrics would obtain in that state, and gradually a better grade of pediatric practice would be secured throughout the South.

The officers of our Section, since the Asheville meeting, have worked diligently and successfully on this project. As a result, the following state pediatric societies may be reported as already organized. They are mentioned in order of priority: Georgia, Mississippi, Florida, Kentucky, North Carolina, South Carolina, Missouri, Tennessee and Texas. Nine out of seventeen, including the District of Columbia, is not a bad showing for two years' work. However, nine is not enough; we need all seventeen if we propose to organize properly.

Let me impress upon this Section the importance of early organization and active functioning of a state pediatric society in each of our Southern states. Every member of this Section has a duty to perform, a duty he owes to his Section, to his state and to the South. That duty is to organize thoroughly without any undue delay a pediatric society in his state. In the event a state pediatric society already exists in his state, he should lend his active support and influence to its commendable workings and undertakings.

It may as well be realized by us now, rather than later, that this Section will never measure to its full responsibilities and properly fill its sphere of usefulness until the general practitioners are given proper consideration in our process of organization and future development. To visualize the objects and aims of our Section in a small and circumscribed way, looking only to the advancement and improvement of our Section members, would defeat our present main objective—"better pediatrics in the South."

If a close relationship is established between the Southern state pediatric societies and our Section on Pediatrics mutual benefit will be forthcoming to both organizations. The stronger the state pediatric societies become, the stronger will it make our Section, and vice versa, the stronger and more representative our Section becomes in state representation, and in the higher grades of solid pediatric work, the more readily will the state pediatric societies look to us as the fountainhead for dissemination of leading pediatric thought in the South.

As the humble originator and promoter of this scheme of organizing state pediatric societies, it has been my good fortune to have been quizzed on this subject by a fairly good number of members of this Section. Also, as Secretary of your Section last year, I had a good deal of correspondence with various members as to the *modus operandi* of organization. From information gleaned from these two sources I have been led to believe a good bit of confusion exists about the objects and purpose of a state pediatric society.

May I, therefore, venture to give my ideas on the subject? These ideas are subject to approval or disapproval of this Section.

1. The object of a state pediatric society is to obtain better pediatrics for that state. This can be best accomplished by reaching the general practitioner and getting him interested in the study of pediatrics. His interest will not be secured by organizing a state pediatric society composed entirely of pediatrists. He would naturally look upon such a society as one devoted exclusively to the advancement and improvement of the pediatrists. Therefore, eligibility to membership in a state pediatric society should be: "membership in good standing in the state medical association, a desire to have better pediatrics in the state, and a willingness to work to that end." Thus with eligibility to membership made inviting to the general practitioners the scope of the state pediatric society is thereby enlarged and gradually the standards of pediatric practice in the state can be elevated.

2. A state pediatric society should not ask, or permit, the state medical association to make a distinct pediatric section out of it when it comes to presenting the

state medical association's yearly program. The pediatric society should ask and, if necessary, insist that a place on the general program be assigned it. The object of this is to have papers and discussions on pediatric subjects reach the general practitioners. If this is not done, the general practitioner is not reached and the prime purpose of the state pediatric society is not fulfilled.

It should be the responsibility and duty of the officers of the state pediatric society to see that the pediatric program presented before the state association contains papers that are non-technical, timely and include in their preparation the latest ideas on any new line of thought or practice in pediatrics. It should be realized that the state pediatric society has full responsibility of keeping the general practitioner of his state well informed on all pediatric subjects. In this way the pediatric society can be popularized and will in consequence receive the earnest support of all members of the state association. Gradually it will be appreciated that the state pediatric society is of help to the general practitioners in keeping them well posted on the latest advancements in pediatrics, and therefore is filling a distinct need in the state association.

3. The state pediatric society should be a component part of the state medical association and co-operate with it in every possible way. It should ask the state association to allow a morning or afternoon session on the general program for the reading and discussion of pediatric papers. In this way proper recognition and distinction would be given to pediatrics in the state. It might be further asked, if it does not conflict with the constitution and by-laws of the state association, to allow the pediatric officers to preside over this session. Furthermore, if it be agreeable to the program committee, permission might be asked to have the pediatric society proceedings designated on the official program under the caption "..... ..... State Pediatric Society Proceedings."

4. The state pediatric society should hold its annual meeting at the time and place of the state medical association meeting. In this way a better attendance is assured and a more enthusiastic interest will be secured. An annual smoker, or banquet, should be held, as the most direct route to a man's heart is by way of his stomach. At the smoker, or banquet, the business session might be held. The election of officers (President, Vice-President and Secretary) should take place and a constructive program outlined for the year's work. This program should be especially directed to include work along the most important and urgent pediatric problems pertaining to the state's welfare.

5. As the ultimate object and purpose of the state pediatric society is better pediatrics for the state, and as the division of child hygiene in every state board of health, where they exist, has for its reason of existence the same object and purpose, necessarily there should exist a close co-operation and mutual working between the two. The officers of the state pediatric society should constitute the executive committee of the state pediatric society, and this executive committee should willingly and voluntarily serve as members of the medical advisory board of the state division of child hygiene. By this arrangement of organization a powerful machine will have been created which, if efficiently managed and directed, can not fail to give better pediatrics in the state.

6. The organization of a state pediatric society is not a difficult proposition. One or two interested men can easily perfect it. A selection of all the pediatrists of the state, and as many general practitioners as advisable who are interested in babies' and children's practice, should have a letter written them. The letter should state that at the next state medical association meeting there will be held a pediatric banquet for the purpose of organizing a state pediatric society and a cordial invitation is extended to them to be present. Have the secretary of the state medical association place upon his official program an announcement that there will be a pediatric banquet or smoker on some definite night of the state association meeting for the purpose of organization, and that every pediatrist and general practitioner interested in infant and child welfare is invited to attend.

There probably will be ten to twenty physicians to respond. During the course

of the banquet or smoker the object of the meeting is stated and a temporary chairman and secretary are elected. The chairman then appoints a committee on resolutions and another on nominations. A resolution embodying the organization of the pediatric society should have been previously prepared and turned over to some member of the resolutions committee. The resolutions committee, after a short retirement, reports their deliberations and decisions. The resolutions are adopted; likewise the nominating committee nominates the permanent officers, who are duly elected, and organization is completed.

I apologize to the Section for going into such details of organization, my reason for this being that some of our interested members had an idea that it was a difficult task to perfect organization.

When complete and perfect organization of a pediatric society in every Southern state has been accomplished as above outlined, this Section can feel that it has reached a point in its development where its good work and influence will be many times augmented. The deliberations and decisions of this Section, under such organization, will ramify into every Southern state pediatric society, and from thence, quite naturally, into every Southern state's division of child hygiene, and through this agency into every civic and voluntary organization of infant and child welfare in our Southland.

It has occurred to me if a similar plan of organization were adopted and put into active operation by the Pediatric Section of the American Medical Association, thereby insuring a state pediatric society in every state in the Union, would it not result in decidedly elevating general pediatric practice in America? It is well recognized today that American pediatrics has developed to a very high point of efficiency. In this commendable development of efficiency is it not the pediatrists who are the chief beneficiaries? Would it not be a wise and proper move on the part of pediatric organizations of America to concentrate a little more on the needs of the general practitioners and satisfy themselves that the general practitioners are receiving their just deserts in our rapid strides to more perfect pediatric knowledge and practice?

RESPONSIBILITY

With such a strong organization operating in the South, this Section will have to justify its existence. If this Section is to take unto itself the guardianship of the proper development of Southern pediatrics, then every member of this Section will have to give to his Section the very best that is in him. Any organization to justly deserve the title of leader of Southern pediatrics will have to win the prestige and confidence that is essential to any successful leader.

While a few of the members of this Section are substantially, and most creditably, contributing to national and international pediatric literature, there is need for more of our members to exert themselves along this line. To do this will require that our pediatric work be more thoroughly and carefully done; our clinical observations be made with proper study and keenness of vision and results of same be duly recorded in a fearless, painstaking and impartial manner.

It is true the South has not been blessed as much as other sections of our country with munificent endowment funds for the carrying out of experimental and highly specialized scientific work along pediatric lines. The fault may lie with us in not sufficiently exerting ourselves to secure these endowments, or in not showing enough earnestness and proficiency along these lines to warrant such gifts. Whereever the fault lies, it is high time for us to wake up and improve our activities in this field. The members of this Section are fully qualified with previous training and sufficient intelligence to contribute not only their fair share, but to exceed their quota, if it be necessary. Work, grit and determination will necessarily have to be important factors in its accomplishments. In this connection it may not be amiss to recall Thomas Edison's definition of genius: "one per cent inspiration and ninety-nine per cent perspiration." We have it in us, therefore let's be fair with ourselves and fair to American pediatrics and "deliver the goods."

Another responsibility that occurs to me is the encouragement of, and if necessary insistence upon, a higher grade of pediatric teaching in our Southern medical schools. By this I do not mean to disparage any of our Southern medical schools; rather to stimulate them to extra efforts and call their attention to the responsibility resting upon their pediatric departments. This elevation of pediatric teaching can be best accomplished if this Section lends its full support, help and influence to the pediatric departments in our colleges that are taking their work seriously and offering to the students of pediatrics the proper scientific and practical clinical courses.

The same attitude should be taken regarding post-graduate work in pediatrics. In short, all pediatric work done in the South should have the yard-stick applied to it, that yard-stick being "better pediatrics in the South." The yard-stick should be applied fairly and fearlessly. If the pediatric work under question measures up to requirements, thereby helping to give us better pediatrics, then it should receive our encouragement. If, on the contrary, it is proving a drawback to students of pediatrics by misleading and preventing them from securing a more thorough and practical course elsewhere, it should receive our discouragement until such time as its work and activities will have proven acceptable.

Again, under responsibilities, let me stress, even though I repeat myself, the urgent necessity for the members of this Section to return to their states and take definite steps to organize a state pediatric society. Also permit me to call attention to the fact, as previously mentioned, that the highest point of efficiency in a state pediatric society will have been accomplished only when first consideration has been given to the general practitioner.

Preventive pediatrics is another most important subject that should receive very earnest and sincere consideration from this Section. We all recognize it as the ideal and best type of pediatric practice today. Last year, at our Louisville meeting, we were most fortunate in having a joint symposium with the Public Health Section on the subject of "Communicable Diseases." It was a most excellent and profitable meeting for both sections. This year it has been practically impossible to find time on our program for another symposium, although it would have proved of mutual benefit and pleasure to both sections.

The solution of this problem, I sincerely believe, lies in the adoption by the Southern Medical Association of the half-day session plan as carried out by the American Medical Association. This arrangement would permit the Public Health Section to meet in the mornings and the Pediatric Section in the afternoons. By this arrangement members of both sections would intermingle, gain a broader acquaintanceship, exchange ideas on preventive pediatrics and receive the benefit of each other's programs. As a result, preventive pediatrics, in a measure, would receive the attention it so urgently needs.

It is to the interest, and I will say it is necessary, for the proper functioning of this Section, that a closer working relationship exist between us and the Section on Public Health.

Another pleasing responsibility that this Section might take upon itself would be to extend the friendly hand to all pediatric organizations in America, large and small, and promote a closer and more fraternal relationship and more unity of purpose in all pediatric transactions. By such co-operation, American pediatrics could not fail to receive great benefits.

Naturally, our chief concern at present is to organize thoroughly and properly to develop Southern pediatrics. We must not, however, in our intensive and commendable work, visualize our field of usefulness in narrow and selfish terms. We are fast becoming an important factor in American pediatrics today. Let us, therefore, in every possible way, endeavor to measure up to this pleasing responsibility. This can best be done, as above mentioned, by friendly co-operation with other pediatric societies and by contributing regularly, not sporadically, something substantial and distinctive to American pediatric literature. The South has pediatric prob-

lems that rightly should be solved by Southern pediatrists.

PROSPECTIVE

As we look over the field we are at present working, and in which for many years to come we will continue to labor, the future unfolds before us a most encouraging and inviting picture. The Southern fields lying ahead of us are the most fertile and promising ones in America today for pediatric work and future development. In certain areas the surface of our soil has scarcely been scratched, no proper tilling or systematic working has been practiced. The soil is genuinely rich and full of possibilities, probabilities, and I will say with certainties.

Our men to till and work the field are divided into two classes: first, the Southern pediatrists; second, the Southern general practitioners. Today the Southern pediatrists are more ambitious, more determined, more capable, better qualified and more responsive to accept responsibilities than ever before in the history of Southern medicine. Our Southern general practitioners, much to their credit, are realizing more fully today that the practice of pediatrics is a distinct and important branch of medicine and in consequence are giving more time and study to it. The time, therefore, is most propitious for the proper and liberal development of our state pediatric societies to give to the agreeable and receptive general practitioners that for which they long and desire.

With such facts before us it might be truthfully said that the future of our Section, as regards growth, sphere of usefulness, influence and prestige, is most reassuring. To what extent our attainments will reach in this most inviting and promising field, and to what heights our ambitions will lead us, and how far-reaching our elevating activities will extend, lies in the hands of each and every member of this Section. I sincerely feel, and confidently predict, if every member of this Section will continue to take the same vital interest and pride in our proceedings and development, and in addition will decide to make the interest and welfare of this Section his "hobby" or pet, then the same brilliant success as in the past will continue to smile on this Section's activities.

In closing, let me say I have absolute confidence in your ability, your loyalty and your sincere interest in the success of this Section. I therefore feel that this Section will continue, as in the past, to fill a distinct need in the South and will grow in importance and usefulness until the highest ideals and aspirations of its members have been accomplished.

THE TEACHING OF NEUROLOGY, PSYCHIATRY, PSYCHOPATHOLOGY AND THEIR RELATION TO GENERAL MEDICINE, PEDIATRICS, GASTRO-ENTEROLOGY AND OTHER SPECIALTIES, IN PARTICULAR THE EYE, EAR, ORTHOPEDICS AND GENITO-URINARY DISEASE*

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The nervous system needs broad perspective for its understanding. Experience has shown that this is not acquired where the teaching of psychiatry is separated from that of neurology and when the latter is dealt with as a mere appendage to general medicine. Moreover, the approach to disorders of the mind should not be through the severe or dilapidated case found in the asylum. Indeed not only pedagogically in theory but in actual pragmatic utility, the best material of study is the onset of the milder cases which find their way to the general dispensaries and

*Chairman's Address, Section on Neurology and Psychiatry, Southern Medical Association, Fifteenth Annual Meeting, Hot Springs, Ark., Nov. 14-17, 1921.

hospitals, more particularly when these are furnished with an organized special clinic for disorders of the nervous system. For to these the public slowly form the habit of coming frankly on account of the psycho-sociological difficulties which are so often the cause of "nervousness." The establishment of one of these does not require a large expenditure, all that is necessary being a neurologist of sound technique and broad vision and a small staff especially detailed for this work, with a small ward or series of rooms in the hospital.

In medicine of today the end product is found less interesting than the genetic process. The clinician now seeks early signs so that he can diagnose with some hope of preventing invalidism. This is especially true of the neurological physician and surgeon. Just as prompt interference prevents the state of disease formerly found in the post-mortem rooms, so the power brought by the knowledge of early symptoms will in the future obviate largely, as it does now in a few hands, the debacles not only found in the asylums and courts of crime and divorce, but still more frequently undetected, the cause of the most poignant suffering which human beings can experience.

Very broad perspective is required for the adjudication of many of these cases, a perspective that can not be gained by the acquiring of knowledge in scraps, but demands broad synthetic methods. The intrication of the nervous system with the reactions of personality are even more complex than the brain; for they comprise the nerve endings in the whole body, inclusive of the autonomic system in the viscera, those regulating the endocrine organs, and not only that, but the actions of the internal secretions themselves. Besides this, there is required an especially present comprehension of body physiology and the disorders of nutrition studied by the internist.

To be trained in all this means a long apprenticeship; for in addition to the medical course, including interneship, at least three years' special training is a minimum, and this should be permitted only after a period of general practice, including minor surgery, say of five years, preferably in rural districts.[1]

So complex is the subject that the application of its data is very difficult. The simple sequences found in the laboratory and the text book are seldom manifested in the clinic. Hence in teaching there must be repeated applications to the living patient of the generalities which have to be acquired. Indeed I have found it best of all to permit the generalizations to form themselves in the pupil's mind from the data actually gained by themselves from the study of properly selected patients. It is the inductive method of Francis Bacon.[2]

The utilization of the data of neurology by the profession in general has been most fragmentary and inadequate. Want of attention to these data has permitted the reign of much loose thinking about the symptoms of patients and has even allowed the most fantastical and ill-founded generalizations to rule the profession for years.

METABOLIC STATE AND FOCAL INFECTION

For instance, although diagnosis of rheumatism has lost caste in these days, and uric acid diathesis is no longer in fashion, and the word gout is rarely heard in America, it must not be forgotten that these terms represented pathological processes. One of these is that which occurs when a susceptible individual is subjected to chilling and suffers from pains of variable intensity. Lumbago, brachialgia and costalgia are names given in accordance with the localization of pain.

It has become the fashion to attribute neuralgic and like pains to toxins absorbed from a focus of pyogenic organisms. Thousands of patients are being subjected to the useless torture of tooth extraction, tonsillectomy and abdominal or pelvic exploratory operations in the vain search for a non-existent infected focus. Although many pains are due to remote effects of septic absorption, these are perhaps in a minority. The type of pain represented by that accompanying post-exertional stiffness is of a different origin. Its pathogenesis may be conceived very similarly to that of the lithemia of other days. This state is now looked upon as a tissue acidosis, and it is very easily prevented either

by the giving of oxygen during and immediately after severe exertion; or, sometimes by the maintenance of body warmth; or, still more certainly by a sufficient injection of alkaline base-producing substances such as fruits with a diminution of the acid-producing proteids. It is the condition that I named hyperproteosis.[3] This valuable concept of the physicians of other days has tended to pass from men's minds in recent days of bacteriology and the deadhouse, but now that physicians have again turned their minds towards the processes occurring in the living body, this chemical concept is again influencing medical thought.

Unfortunately those who have retained the metabolic interpretation of disorders are too ready to attribute to it every ache and pain, and they rarely think at all of the nervous system. They fall into the danger of not considering that a sciatic pain may signify a radicular inflammation which will lead to tabes dorsalis; and that a dull ache in the chest or arm should not be treated by massage and hot and cold applications when it, too, is a sign of a beginning tabes. For months they will subject to hydrotherapy, the painful area due to a tumor of the spinal cord.[4]

LOCALIZERS AS SPECIALISTS

More dangerous than these, however, are the "localists." To these an aching of the rectum calls for merely proctological manipulations. A diplopia calls for prismatic lenses. Vomiting attacks demand an exploratory incision after the failure of chemical analysis or thread test to reveal a pathogen. Urinary or copulatory difficulties and pain demand sounding and irrigation. For coughing attacks, the larnyx must be painted.

The Wassermann test of the blood is only an aggravation; for, when negative, it tends to confirm the insistance upon local treatment.

Now, all the aforementioned symptoms may be prodromata of tabes dorsalis, and 40 per cent of the instances occur when the blood is negative to the Wassermann test. In the early stages they may occur without loss of the knee jerks or modification of the pupils; only a minute examination of the nervous system or a cytological study of the spinal fluid will permit of a diagnosis. Even, however, when the neurological signs are conspicuous errors are still made. I subjoin an instance:

A school teacher suffered for years from recurring pain and numbness in the legs, for which she spent months at some hot spring. Pains believed to be rheumatic and too active life were reasons given for her being less able to perform her work.

Referred to me it was found that deep reflexes were absent everywhere, the pupil did not react to the light, sensibility of lower limbs was seriously impaired, and there was some incoordination. A diagnosis of tabes dorsalis was made.

Specific treatment enabled her to recover weight and strength, after which she performed her work more satisfactorily than for five years.[5]

IMPROPER DIAGNOSIS OF NEURITIS OR ARTHRITIS

To these sins of omission regarding neurological diagnosis must be contrasted such a sin of commission as the diagnosis of neuritis so frequently made without proper warrant, when lumbago should be incriminated. Actually neuritis proper is not common of a single region unless there has been trauma or exposure. Besides there are very clear physical signs of neuritis when present; for instance, a true hyperalgesia, with losses of the finer sensibility and usually exaggeration of deep pain sense, diminution or loss of the reflexes, except in the very onset, and muscular weakness, and later wasting and diminished electrical reactions.[6]

Less frequent is the opposite error of diagnosing arthritis when neuritis only is present. In the cases which follow, first arthritis and then organic nervous disease was supposed instead of the psychogenetic condition actually present.

SUPPOSED SCIATIC NEURITIS AND SACROILIAC ARTHRITIS REALLY DUE TO TRAUMATIC HYSTERIA

A man believing himself severely injured in a railroad accident, when referred for examination, showed the motility not impaired, except when interfered with by complaint of pain on right behind lower lumbar region. While lying on his face with pelvis supported by pillow, he could fully extend at hips both lower extremities without complaint. While bending forward with straight knees to touch the floor, flexion was restricted by complaint of pain. There was no restriction in hips while recumbent, and no sign of disease in motor tract.

He complained of great tenderness in lower right lumbar region, but his answers as to sensibility were contradictory. A prick of a pin in the sole or sub-malleolar region was most painful,

although tenderness there was not complained of during examination of plantar reflex. That proved that tenderness was only present during the patient's expectant attitude towards it.

I interpreted the sensory changes as due in part to the conditions of the examination, which were such as to suggest powerfully a difference of feeling on the two sides. His reactions did not occur without his attention being arrested; therefore it was evident that hyperesthesia, if not feigned, was mental in origin.

None of the symptoms were consistent with the supposition that a crushed or dislocated vertebra might be irritating some nerve root. In the roentgen ray photographs of the lumbo-sacral region, there was apparent asymmetry of the fourth lumbar vertebra, the body of which appeared to project beyond the intervertebral disk three-sixteenths of an inch on the right side.

On the left side there appeared to be an unevenness in the position of the articular process and the intervebral disk appeared narrow. There appeared to be a scoliosis of the sacral spine, not shown on the patient himself, nor upon the photograph of the pelvis taken by another radiographer.

These facts show clearly no organic disease of the nervous system accountable for the hypoesthesia on the left. The fact that there were differences in the upper part of the body is inconsistent with the effects of injury confined to the lower parts of the back. All the symptoms could result from an insistent imagination that the right side of the back had received a serious injury.

His symptoms did not correspond to those occurring in strain of the right sacroiliac joint, for in this condition there is no anesthesia and the hyperesthesia of sacroiliac disease would not be in the parts complained of by the patient. Also it would not so markedly vary when his attention was distracted. However, he showed a restriction of movement as would occur in a person who believed his back could not move freely.[7]

During examination he sat leaning to the left and putting strain upon the ligaments which hold the right sacroiliac joint in position. If there had been pain in this joint it would have been necessary to lean to the right to relax these ligaments. (See the Traumatic Neurosis, Am. J. Crim. Law, 1916.)

Here is another instance:

SUPPOSED ARTHRITIS AND SPINAL DISEASE QUICKLY REMOVED BY PSYCHOTHERAPY AND RE-EDUCATION

A woman, aged 28, had a chill, after which developed pains and hyperesthesia in left knee. Later on there was tenderness of the lumbar spine, and still later of the groin and hip. The country physician said it was spinal disease and prescribed massage. For a time she improved, but shortly after nausea began, also persistent dull pains in both knees, which led to the supposition that arthritis must be the cause.

Examination revealed hyperesthesia in the knees and one arm, no right abdominal reflex, but the right abductor reflex was exaggerated. I decided the case was psychogenetic and found two suggestive incidents.

The least approach toward the patient's knees caused a spasm of terror, so a course of gradual habituation was begun. First, approach of hand to the knees, then manipulation of patellar region, followed by pressure on it. She was thus taught to control the muscles around the knee joints and prevent their contraction when knee was touched.

Her pain ceased with the spasm; and alarm vanished when she knew she could control her own pain.

The genesis of false fixed ideas regarding disease was then shown, also how to avoid them, and in a week she was well and has continued so.

Still another instance:

A single woman, age 31, was an expert counter in the United States Treasury. She suffered for three months with severe pain in right shoulder and was unable to use right arm, as motion caused her head to turn sharply to the right with a force she could not control. A physician was consulted. His diagnosis was neuritis, and electricity was prescribed. Relief was temporary.

Her condition greatly worried her; she had also another unusual worry. Three months before she had an unpleasant episode with an office associate, over which she brooded. Continuous thought of this enemy unconsciously caused her head to turn to the right in the woman's direction. Her counting only partly occupied her mind, as it had become almost mechanical. Thus she could not resist the motor response to her underlying thought, a desire for harmony. Thus a need of head turning had begun to accompany every use of her right hand by process of psychological association. The pain resulted from action of the muscles antagonistic to the head movement which she consciously tried to avoid.[8]

CHOREIFORM STATES

To the pediatrician or internist often falls the management of patients with Sydenham's chorea. There are many types of dyskinesia to which the name of chorea has been given. Their differential diagnosis is a thorny problem in some instances and requires a wide knowledge of neurological states. Many instances have reached me where an earlier consultation would have been advantageous both to patient and medical attendant. The following is one:

TICS MISTAKEN FOR CHOREA AND DEBILITY

Believed to have chorea, a girl of nine was kept for weeks in a nursing home and given arsenic. Thanks to exercises in control given by the nurse, the abnormal movements ceased. However, the child was regarded as too weakly to return to school.

On returning home to the country, insomnia developed whenever study or reading in the evening was attempted. Some months later I saw her and found that the movements had not been choretic at all, but were symbols of scrupulous

ideas. One of these was that her breath was hurtful to other people because it was an excretion. Hence she compensated possible injury by movement of the lips, which symbolized the healing kiss.

To tread upon living things was cruel. Trees were alive, hence she must prevent injury to the wooden flooring by touching it with her hand. The insomnia was caused by the anxiety of her mother, transmitted to the child lest she stay awake after reading.

The mechanisms of these difficulties were explained to the child as well as to the parents. The absence of neuroticism was made clear to them. The harmfulness of the abstention of an only child from the association of other children was emphasized, and it was advised that the child return to school immediately. The result was most happy.[9]

THE TOO READY DIAGNOSIS OF PSYCHONEUROSIS

Another form of dyskinesia is illustrated by the case of a dentist in Wilmington who, after a cholecystotomy, followed by three weeks' partial coma, found himself amnesic and unskilled in manipulation because of a tremulousness and clumsiness in the hands. Several physicians insisted upon a diagnosis of psychoneurosis, and even in a special hospital the correct interpretation was not forthcoming. His speech had been labored and there had been paresthesia of the right side, dragging of the right foot and hemianopia as well.

Examination showed right plantar reflex absent with exaggeration of the deep reflexes. The deep pain sense was absent in the right lower limb, although there had formerly been extreme tenderness. There was sensation of an unpleasant burning kind on the right hand and a constricted sensation on the right shoulder and side of the neck, as if bound in flannel, and there was a distressing feeling when the right thigh, sole or abdomen was stroked. The clumsiness was still present, diadocokinesis being very awkward in the right. There was an uncertainty as to the attitude of the right toes. An over-prominence of the right platysma when in action was the most marked motor anomaly.

These signs along with the history clearly indicate a thalmic syndrome, which must be taken into serious consideration before regarding as psychogenetic any peculiarities which the patient displayed. Thereby much loss of time, money and distress of mind would have been spared this patient. The advice I gave was that he change his occupation into one not demanding manual skill. The case is a striking instance of the advantage to be derived from neurological training of the more intensive kind, as an imperfectly trained man might easily permit himself to attribute to psychoneurosis the natural anxiety of this patient, a dentist, to know exactly what was the matter and to be dissatisfied with the vagueness and uncertainty of the answers he received.

GASTRIC SYMPTOMS AND THE NERVOUS SYSTEM

The term nervous dyspepsia has been responsible for thousands of medical disasters. Today gastroenterologists are becoming aware that neurological factors are the principle ones in many of their cases, and are calling neurologists to their assistance. A nice appreciation of the purely neurological factor and of the still more subtle psychological factor is of inestimable advantage to the patient. Unfortunately the gastroenterologist often continues to focus the patient's attenion upon his digestion, and this is not to his advantage. On the contrary, the man entranced in psychopathology has a tendency to attribute to the psyche far more than is justifiable. Further, these men are not trained to make the very important practical distinction between the patient whose digestion is actually disturbed on account of anxious emotion as against the patient who insists far more emphatically upon his digestion, but in whom the digestion is actually not disturbed at all except in so far as this function dominates his mind. To cure the latter case, it suffices to get rid of the dominant suggestion, a comparatively easy matter. To restore peace to the anxious individual requires much knowledge of psychopathology and often great skill in its application. The gastroenterologist who does not even make this distinction has not approached the rudiments of knowledge for dealing with these functional neuroses.[10]

I append an instance of pseudo-gastropathy:

The mother of three children suffered "tension" and actual "cramp" in abdomen since birth of first child. Consulted a gastrologist and told him she felt muscularly weak, had much flatulence, and was afraid to eat, as some things upset her.

He immediately insisted she should stuff, and that it was food she needed. He prescribed a strict diet, which she conscientiously tried to follow, but she was uncomfortable and in constant fear of being upset. One week she lost weight; then the doctor said "starve."

Thoroughly discouraged, she was sent to me. Her diet was continually on her mind, and even when eating slowly she had a feeling of hurry. Upon examination I found her muscles unusually strong. I then made her leave home for two weeks and the rigid diet was gradually relaxed without her knowledge. She was required to take exercise for physical upbuild and perform tasks she found difficult for psychic hardening.

With careful supervision these measures enabled her in a few weeks to return to her home and a happy family life.[11]

CARDIO-VASCULAR DISORDERS AND THE NERVOUS SYSTEM

Concerning these, similar considerations apply. Thus a woman of thirty years, having frequent attacks of palpitation, polypnea, with chilliness, moisture and cyanosis of the extremities, rigidity and pain in the neck and back, nausea and a sensation of great weakness and dizziness, suspected she had heart disease, of which she had a great dread.

Examination showed no physical disease, the only signs present being those of hyperthyroidism. She had been an exceptionally strong girl, without worries except anxiety over the health of an invalid mother. She had always feared high places, but thought nothing of it, as the other members of the family all felt the same way. There was no fear of the dark and no social timidities other than a dislike of being conspicuous.

Having an overpowering fear of losing consciousness on account of this palpitation and heavy sensation of oppression, she had for eight years been unable to remain in a church or theater, or unless accompanied to cross a wide street since four years.

When asked to relate the first occasion upon which she had experienced the trouble, she was able to recall, after some effort, that in a small, ill-ventilated church, on a hot summer day, she had begun to feel an overwhelming sense of illness during the sermon. The compulsion to leave the church was intense, but as she sat near the front, well back in the pew, she was unwilling to create a disturbance by leaving, so forced herself to remain. This attack was followed by others which occurred more often as time went by, although at first they were avoided if she sat near the door.

The diagnosis was that the agoraphobia and claustrophobia were hysterical in origin, arising from the powerful suggestion of the recollection of a particular experience, made efficacious now only by the timorous imagination of the patient.

The hyperemotivity of hyperthyroidism is occasioned by numerous circumstances, whereas in her case emotion was contingent upon very definite circumstances only. The hyperthyroidism was therefore secondary. Relief of the chronic emotional strain was believed sufficient to cure this.

Re-education was forthwith begun. The patient was at first unwilling to undertake it, giving the excuse that she had never been willing to introspect, but she accepted the necessity of doing so when it was explained that a person is under an obligation to know himself and that it is futile to oppose this need. It was explained that her dread of a close or open place was due to her ignorance of the mechanism of the consequences of a wrong way of looking at things and the consequent emotions, and that only when she obtained a true insight into her own psychological machinery would she be able to control it. The power of induced ideas and the feelings produced thereby were explained to her. After a while she accepted the explanation, adding: "It must have been fear, for on the first occasion when leaving the church one of the maids said: 'What frightened you?'" She added that she was naturally a self-contained person and was relieved after the relating of her feelings.

When asked to write an account of her view of her own psychology, she did so, showing a clear grasp of the power of conceived ideas, and concluded by saying: "It is difficult for me to understand that these signs of illness are not illness at all, but are caused by an induced impression. But now with the assurance that there is absolutely nothing wrong with my physical make-up, my problem seems to be to rid my mind of the fear which has unconsciously but completely controlled my thought."

So the next step in the treatment was to demonstrate the truth of this. I accompanied her to a large square and made her cross it alone. This feat accomplished, though under great strain, she declared that it had been performed better than at any time since the start of the trouble. Later she attended church with only momentary discomforture, when she reasoned concerning it and concluded that nothing could happen. I concluded with the final adjuration that since she realized she was well, all then depended upon herself.

Thus violent, persistent, long-continued agoraphobia and claustrophobia were traced to a single incident upon which they were dependent. They were removed in less than a week by efforts directed toward giving the patient an understanding of their mechanism, indeed, compelling her to grasp it and then compelling her to take an exercise which afforded a practical demonstration and the patient is well four years later.

FURTHER CONSIDERATIONS REGARDING FUNCTIONAL CARDIAC DISORDERS

But there is another factor here which is not adequately grasped by internists. I refer to these cases in which occurs hysterical phobia regarding the cardiac function which is based upon the presence of some degree of physical cardiac disturbance, such as valvular disease, or merely asthenia or irritability of a myocardium. These patients are usually met by the assertion that there is nothing the matter with them. This dictum is false, and they lose confidence in the opinion of the internist. Thus a patient writes as follows:

"If I have nothing wrong with my heart, why does it beat more rapidly than it should? Why does it intermit? Something is wrong or it would not. Why does a little exercise cause it to increase so materially? Why should I be so exhausted the greater portion of the day? If nothing organic, why should my pulse rate be sixty-five or seventy lying in bed in the morning and go up to over one hundred and twenty-five after a simple breakfast and a walk of not over three or four blocks? And if I have nothing wrong, why does this condition exist when I don't think about it?"

All this is in spite of the assertion of three great cardiologists that there is nothing the matter with this man's heart.

I have dealt successfully with these cases on the same principle as one deals with hysterical incapacity when engrafted upon actual physical damage whether to connective tissue, muscles or nervous system.[12] The method is to diagnosticate the actual degree of physical damage, to enlighten the patient as to this, and then to make him comprehend that the total disability in which he believed is not justified by the physical state, but is psychogenetic. After this instruction psychological exercise for restoration of function is not difficult.

This principle I believe to be desirable in what is known as the effort syndrome. Under this term, however, have been included three different states. These are (1) myocardial insufficiency from infectious toxins or overexertion; (2) congenital neurocirculatory asthenia; and (3) anxiety neurosis. The standard treatment for all is properly regulated exercise, but the principle at work differs in each. Inadequacy from toxins is only aggravated by exercise. It is only after a period of rest that exercise benefits. Often gradual training is demanded of the myocardium. The asthenic first, as would the normal, must increase his powers of proper physical exercises. In the anxious case the principle is quite different. The progressive increase of performance merely demonstrates to the patient that he can perform the task he feared. It is an indirect method of suggestion. It would have been preferable to frankly utilize psychotherapy in the first place; for, emphasis upon the cardiac function only reinforces the patient's erroneous belief that it is impaired.

ENDOCRINE FACTORS

The part played by the internal secretions in the reactions of the nervous system I am far from wishing to minimize. Many careful observers have reported very numerous examples in which I have not been behindhand. I have watched some cases for ten years. The limits of this address, however, do not permit the consideration in detail of the highly important endocrine factors of disordered nerve function of which we neurologists see very many, and of which we are certain of many and suspect still more, without countenancing the unjustified claims of extremists.[13]

NEUROLOGICAL AID IN ORTHOPEDICS

The principle of analyzing the incapacity so that we can determine to what degree it depends upon lesions or intoxication, and to what degree it is psychogenetic, was most fertile in the case of thousands of soldiers injured in the great war.

The orthopedic surgeons who dealt with the situation completely failed to improve the capacity of the men. It was only when those versed in the reactions of the nervous system, and particularly psychopathologists, intervened, that those men could be recuperated. In civil practice, too, the orthopedist can be greatly helped by early neurological consultation.[14]

Thus a woman thrown from her horse had pain in the buttock and back of the thigh. Her surgeon permitted her to go about until a neurological acquaintance, noting that she kept the limb partially flexed at the knee, asked her if there was not pain on coughing, when she admitted that a cough produced a sharp pain shooting down the leg. The neurologist, suspecting a laceration of a spinal root and the probability of a ligamentous tear on account of this, urged a roentgenograph. This revealed a severe sacroiliac tear.

The preceding consideration of arthritis in relation to neuritis and the differentiation of the nature of abnormal movements also show the advantage to the orthopedist of collaboration with neurological colleagues.

GENITO-URINARY DISEASE AND THE NERVOUS SYSTEM

The tendency to overlook the role of the nervous system is even more prevalent among surgeons, who have to deal with highly objective relationships in their manipulations, for it is not easy to think constantly of fundamentals when one constantly deals with consequences.

For instance, upon a man who developed excruciating pains in the bladder shortly after a violent mental confusional attack, a cystotomy was instantly performed without reference to neurogenic factors. When seen three months later I found exaggerated deep reflexes, the right plantar reflex slightly extensor, contracted pupils which scarcely reacted to light, loss of vibration and deep pain sense, paresthesiae which kept him awake, and a history of sciatica and jerking of the lower limbs, along with much diminished diadocokinesis. Mentally he was irascible, with a memory weakened 25 per cent, calculation unreliable and 65 per cent slowed. Evidently, then, pains for which operation was performed were vescical crises, and should have been treated medicinally.

Another frequent case where genito-urinary specialists require neurological assistance is that of impotence, for this may arise without any structural impairment whatever.

Most gratifying success falls to the practitioner who makes himself acquainted with the mechanism of this kind of impotence and who uses skill in the application of psychopathology to the individual case. It is most detrimental to strengthen the patient's obsession by increasing the attention upon the genital organs. The careful study of its genesis is the essential preliminary and I do not recall an instance where this has failed to restore functional capacity.

OPHTHALMOLOGY AND NEUROLOGY

One has to remember that the complex refractive media of the eye are, after all, only subservient to the neuro-muscular apparatus. To understand the disorders of the optic nerve and the ocular nerves, neuropathology must be known. Some ophthalmologists do not realize this; and I have known of several cases in which operations for the elongation or shortening of the muscles have been used in paralysis arising from *leptomeningitis chronica.**

Now it is evident that if the ophthalmologist had made himself familiar with neurology, such errors could not have occurred. Knowing when one needs advice is surely a valuable asset and indicates the proper medical training lacked by the mere optician.

In the diagnosis and management of psychic blindness the psychopathologist can be of great assistance, too. It is a pity that there is not more co-operation between the two branches.

The lack of proper neurological collaboration has been responsible for the persistence of the error that constriction of color inversion of the visual fields are indications of hysteria. But even if a competent neurological survey in these cases does not reveal a physical cause at the time, yet the subsequent course of the disease responsible will later show a disturbance of cerebral circulation if not a lesion in some portion of the optic pathway.

*The Pathology of the Cranial Nerves in Tabes Dorsalis. Am. J. M. Sc., 1909.

AMBLYOPIA FROM PSYCHIC SHOCK

Very different is the situation regarding such an amblyopia as is manifest to the patient, which usually occurs suddenly, as in the case of a woman who saw her daughter killed by a railroad train before her eyes. It was a psychiatrical study of the patient which ascertained that the mechanism of this blindness was a wish to shut out from view so terrible a world. By a therapeutic which was purely mental this woman's vision was restored during a stay in the hospital of only two weeks.

PTOSIS TIC OF HYSTERICAL MECHANISM, CAUSING COMPLETE INCAPACITY FOR MONTHS, REMOVED IN TEN DAYS

The following is a case where fear of loss of sight had accompanied a ptosis of psychogenetic mechanism. It was necessary sedulously to avoid even examining the patient after the first diagnosis had been made. Even visits were studiously neglected as one of the means of persuasion that there was not by any condition demanding surgical or medical procedure. The taking of this precaution enabled a cure to be obtained in a few weeks in this case, which might be labeled either palpebral tic or hysterical ptosis. The condition had been greatly aggravated by the frequent repetition of examinations, ophthalmological, psychiatrical, medical, neurological, serological, endocrinological, and so on.

None of these had sufficed to ascertain the genesis of the tic, which was really done by an intelligent anamnesis in conjunction with a study of the actual character of the ptosis. The falling of the lids occurred irrespective of fatigue, in the absence of conjunctival irritation, without the least sign of facial paralysis, nor other organic nervous disease. Although the closing of the lids was usually imperative, yet they could sometimes be opened spontaneously by different devices.

This is characteristic of every tic. However, the more the patient wished to open the eyelids, the more tightly and longer they closed.

At first it was only by methods of distraction that they could be opened by me. These, of course, were merely for diagnostic purposes; for therapeutically they are inefficacious. The patient had already discovered this after the eventual failure of such methods as clacking the tongue, coughing, whistling, etc.

The genesis was interpreted as follows: the conjunctiva had become irritated by considerable driving along dusty roads in an automobile in the glare of the summer sun in conjunction with the short sleep and the conviviality entailed by late hours.

The protection of the eyeballs by lowering the lids was the consequence. In the manner of the tics, this psychological response eventually became a psychological habit. This habit the patient might have shaken off as he had done previously other tics; but in consequence of repeated medical opinions expressed before him by distinguished men in a famous hospital near by, there was added to the habit the phobia of the inability to open the eyes and the fear of loss of sight, and with it earning capacity.

THE EIGHTH NERVE AND THE NEUROLOGIST

A knowledge of the structure and function of the nervous system is absolutely essential for the interpretation of many disorders of hearing too often treated empirically. Tumors of the posterior fossa, sclerotic processes in the mid-brain, affections of the temporal lobe and its tracts, nascent tabes dorsalis, all affect hearing. But the eighth nerve also contains the pathway of the vestibular sense and furnishes the impulses for the complex integrations of orientation with the movements of the eyes, trunk and limbs. Space forbids details of numerous tests of these functions and their interpretation, to which minute knowledge of the central nervous system is also absolutely necessary.

The so-called Barany methods are quite inadequate for a complete study of these integrations. Even the much finer differentiations ascertainable by the researches of Lombard are the better if the knowledge is in the hands of an experienced neurologist. The realization of this need is, I regret to say, absent from the minds of too many otologists. I trust that my colleagues will have greater success in educating ear specialists to this lack than has fallen to my lot. *How can we blame the public and legislators for their recognition of osteopathy, chiropraxy and Christian Science* and criticise them for not distinguishing between the training of these persons and one of us, when so many of us roll like a mole in a hole around a single function, or a minute organ, and refuse the vast perspective afforded by the linkage of function and organ by the ramifications of the nervous system which controls them all?

TWO PSYCHIATRICAL SHIBBOLETHS

While insisting upon perspective, it is necessary to allude to two matters in which this has been lacking among many psychiatrists. One of these is the half acceptance of some crude psychologizing which assumed the name of psychoanalysis, while ignoring all other uses of the process of analyzing the mind. It was a gospel whose adherents became fanatical (which meant no longer scientific in method) and it distorted their vision so that they could no longer adjudicate facts. This is not to say that many of the data which these "psychoanalysts" have emphasized are not true. Thus in an instance of fear of being alone, which I studied in 1911, an investigation revealed an unformulated fear of a half-wished-for assault by a negro as the prime cause. There were many then who maintained that this revelation itself would dispose of the phobia. Feeling that this was wrong, however, I advised the patient to get rid of an aunt who lived with her and prevented her from independent thinking. It was not until this was done two years later that the phobia ceased.[15]

The other matter in which perspective has been lacking in some of us is that of the function of heredity in nervous disease. The fatalistic use of the concept has stalked under different formulæ: among the French it is degeneracy; with Adler, constitutional inferiority; with us, psychopathic constitution. The patient who falls into the hands of this kind of pseudoscientist is like the dog who is hung for a bad name. This theorist throws up the sponge without attempting a genetic study of the patient's aberration with a view to a psychological reorientation.

On the contrary, in the case of a man of 28, published 1910, an execrable heredity existed in every one of the numerous uncles and aunts as well as the father and mother, while one brother was a confirmed epileptic who died, and the other a "wanderluster" of the precox type. Yet the pantophobia which had existed during the patient's whole life and had caused a complete seclusion of six months' duration, was completely and permanently removed in the space of two weeks by penetrating its genesis and reorientating the patient, who for eleven years now has succeeded in the strenuous professional struggle in a great city.

The foundation of the doctrine which permitted a therapeutic attempt to be made in this case is, of course, a philosophical perspective which does not fall into the error of confounding determinism with fatalism. The psychiatrist must never forget that his own function is that of one of the most powerful determinants in the issue of his patient's malady. Against the action of this conception is massed the influence of the vast population of the insane asylums. The resident there has not usually adequate

time or means or energy to bring to bear all the resources which our art now affords, especially if he is already too much imbued with the idea of the inevitability of the status of his patient.

I recollect one instance of an inmate who had been four years regarded as a hopeless dement, and for whom an early death was anticipated because of his emaciation through refusal of food, mutism, and because he did not control his dejection. And yet, a twenty minute interview showed that this man was merely a profoundly timorous psychasthenic who had completely lost heart, overburdened by the psychological puzzles he had been endeavoring to solve before his incarceration. Placed in another institution, he returned to normal life after four months' careful bodily and mental nursing.

This is not to imply that two neurones can be grown where only one grew before. It is merely to emphasize the need of alertness to distinguish between psychogenetic and neurogenetic, which the former can so well simulate. To those who were not convinced before, the great war provided innumerable instances. But even now some neurologists ignore the prevalence of the psychogenetic and seek always a materies morbi. To do this is to drive many patients away from our profession into the hands of those charlatans who are not blind to the role of the psyche.[16]

CONCLUSIONS

This is only an imperfect sketch of a vast subject, for it is not possible in a short address to compass so large a field. The members of this Section will have supplied many examples in their own practice, where clinical knowledge of the nervous system might have received earlier application. The subject has been chosen by me, however, in order that each of us might stimulate and spread among his colleagues the need of that close cooperation with us, without which serious errors in diagnosis and treatment will continue to be made. Such errors discredit our profession and drive the public to seek the services of charlatans, who *are thus enabled to masquerade under different banners as physicians;* and indeed to receive even the recognition of courts *and legislatures,* against which recognition, in the public interest more than in our own, we are compelled to wage war. But our success in this struggle is dependent upon the *degree of service which we do mankind.* This, I have tried to lay before you, is seriously jeopardized by the present lack of co-operation of the medical profession in general with those who have made a special study of the complex intricacies of the nervous system, not only in the sphere of the reaction of the whole organism with other organisms which shows itself as behavior, but also in the sphere of reactions which so often simulate bodily disease and deceive the unsophisticated into believing in a disturbance of local origin when it is of the nervous system alone.

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OUR PROBLEMS*

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Unfortunately we have no adequate term to designate our specialty. The roentgenologist is one who deals with the science of the x-ray. The radiologist utilizes radiant energy, particularly radium.

Roentgenographer and radiographer have come into use as dignified terms for technicians. The greatest problem for the new worker in roentgenology today

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is the study of the range of normal phenomena in a given individual.

The greatest problem in radiology is the study of the comparative susceptibility of normal and pathologic tissue to radiant energy. The comprehensive use of the x-ray is not truly a specialty. Its intelligent use necessitates, step by step, coordination of other diagnostic and therapeutic factors.

A familiarity with the stages of various pathologies and varying intensities capable of photographic effect or screen visualization presumes a knowledge of both the pathology and histology surrounding the field of examination and is limitless in its scope and application.

There is unquestionably a toll of disability and mortality from attempts to correct morphological changes and exaggerated functions that are largely compensatory. Tissue that is intended by Nature for repair may be destroyed by the surgeon, due to our misinterpretation.

A wide range of familiarity with compensatory phenomena necessitates an intensive study of the whole field of medicine. Normal habitus and its variations mistaken for pathology has furnished a yearly toll of error. Departure from the classical is common. Conformity to the supposedly classical is frequently a curiosity.

OUR LIMITATION

Our limits are measured by our individual capacity for the application of knowledge. Without a familiarity with the common endocrinopathies we may be lost in the examination of bone changes or other anomalies. The significance of adenopathies referred to us for diagnosis and treatment depends on our ability to determine their origin.

The significance of calcium and its distribution may be vital in prognosis in the thyroid gland or lungs. The distribution of gas in muscle tissue (gas bacillus infection), emphysematous and pneumo-visceral phenomena whether bacterial, traumatic or spontaneous make possible the determination of the disease factor. The significance of exudates and transudates with their territory of invasion offers limitless originality in technic for their detection.

SPECIALIZATION

Much discussion may be indulged in as to the merits of the surgeon directing the technic of the x-ray examination, and if the problems are orthopedic and the referring physician competent, the roentgenologist has little to commend him over the mechanical technician. If it were possible to be equally proficient in the use of the x-ray and the knife, it were better that the surgeon manipulate the filled appendix with his own finger in the fluoroscopic room; in other words, make his own diagnosis. But the various stages of x-ray technic would require too much time and prevent intensive effort on the part of the surgeon in his own field of work.

That radiologist who feels that his work with the x-ray unaided suffices for a diagnosis is standing in his own light and places him on a par with the physician who can dispense with the x-ray except for an occasional x-ray film.

The radiologist should be peculiarly fitted to advise methods of correction in injuries. He has the means at hand to locate many of the focal infections and sees the end results from metastatic infections. His constant contact with the best minds in the various specialties should fit him as the ideal consultant.

He may see more kidneys with their chart records, function tests and clinical appearance than the genito-urinary specialist. He may see more sinuses and mastoids than the head specialist; more stomachs, hearts, thyroids and lungs than the internists; more cancers and fractures than the surgeon. His opportunity thus becomes the greatest for clinical observation and study of any branch of medicine. Without an intimate contact with the pathologist, therefore, his usefulness may be little more than that of the technician. His judgment may often be pitted against a number of men at one time.

For instance, his report is frequently disputed as to the location of the foreign body, when obstructive emphysema of the lung is the chief phenomena. Both the experience and the training of the radiologist should be such that he may stand graciously firm in his report when it is

warranted, yet be humbly conservative in the great number of conditions in which the x-ray has shown a percentage of error.

Hence, how we may promote co-operative efficiency becomes our really great problem.

THE TECHNICIAN

The technician is our best friend and our constant associate. He is the artist who gives us the topography of the fields we are to invade, but unfortunately he is the potential element in the development of the "commercial laboratory." There is nothing in the medical practice act of many of the state laws to prevent the use of the x-ray by any one who so desires. Any cult or "ism" may diagnose and give medical advice under the guise of a commercial x-ray laboratory. The osteopath and chiropractic finds the x-ray machine the most valuable adjunct in widening his field of approach to medicine.

No state is safe from such encroachment unless its medical practice act provides that the making of a diagnosis constitutes the practice of medicine. Minnesota, Louisiana and Florida are among the few whose laws seem adequate at present.

The constitution of our parent body, the Southern Medical Association, forbids our collective effort at medical legislation, but I feel that a familiarity with conditions may forewarn us individually as medical men, and I will refer you to the September issue of the *California State Medical Journal*, Vol. xix, No. 9, dealing with the technician problem in that State.

EDUCATIONAL CO-OPERATION

The organization of an independent State Radiological Society has served a valuable educational purpose in some localities. In our State one day is set aside for a joint program with one of the other sections during the annual State meeting. In metropolitan centers it is possible for the chairman of the Radiological Section to provide visitors who may present advanced problems in radiology.

NEW PROBLEMS

To the physicists our debt is ever increasing. Three new devices that give large promise have made their appearance since our last meeting. The introduction of a device that in the physical laboratory has given us a measurement not only of the quantity of the various x-ray wave lengths, but has determined for us the energy expended in secondary radiations in the tissue and shown us why much of our calculation of dosage has heretofore been at fault.

The work of Kroenig, Friedrich, Dessauer and Winfz in the development and application of the iontometer (which is the calibration of electrostatic units observed in the divergence of the leaves of a gold leaf electroscope when properly insulated and connected to an ionization chamber within a body cavity) has added much to the accuracy of deep treatment. The high voltage transformer and the new type of Coolidge tube promises an accuracy in dosage and potency in the destruction to deep tissue for which we have long sought.

The danger is correspondingly increased. It is unfortunate that disaster must come to a number of patients before laws will be enacted to limit the use of radium and the x-ray.

The advent of the new technic requires exceeding skill and the results warrant a degree of enthusiasm. Some of the large clinics have discontinued surgery in cancer of the cervix, and but few breast cancers are selected for surgery.

I may here report two deaths from the use of pneumo-peritoneum by competent men, air embolus being ascribed as the cause. I have but recently seen a case of sterilization and permanent skin change produced in a young woman from the injudicious use of the fluoroscope by an over-enthusiastic surgeon. The penetration of short length rays, after passage through a thick copper or zinc filter, has produced death in the patient from deep tissue change without evidence of skin change.

With the higher voltages and heavy filters, death is apt to be produced if the dose is sufficiently large to produce evi-

dence of skin change. Shall we follow our German collaborators in an attempt to produce a cancercide or lethal cancer dose at one treatment, or shall we repeat our application at intervals over the period of probable cell division in the growth?

Dr. Holdhoffer emphasizes the susceptibility of the spinal cord and suprarenal bodies in post-roentgen nausea and covers this area with opaque material during treatment. Dr. Orndorf advises that if all body coverings are removed from the patient nausea is lessened. The cause and relief of post-roentgen nausea is a problem of deep concern.

The production of deep muscle induration with possible abscess is one of the latent effects produced by the writer in a patient who had a negligible skin reaction. The telangiectases of former years were less to be dreaded. Thus latent tissue effect becomes a problem with a new aspect.

The pathological laboratory and dead house become more and more places of interest to us. Judgment in the selection of tonsil cases for treatment adds a new problem to our field, cystic changes being a probable contraindication.

How we may utter a word of caution against the miscellaneous use of opaque salts for pyelogram, the pneumoventriculogram, pneumoperitoneum, etc., without offense is a problem of extreme delicacy.

It is with a feeling of regret that time will not permit an elaborate discussion of the few problems that have here been so lightly touched upon. Let us each in his small way be a means to help this great body of earnest men constituting the Southern Medical Association, and let our infant Section be known as a place where the allied workers may find a welcome and a wholesome grain of truth.

I wish to thank the officers who have contributed most of the work toward what seems to promise a successful meeting and the Council and officers of the parent body who have provided the facilities for presenting our branch of science.

THE ROENTGENOLOGIC DIAGNOSIS OF GASTRIC CANCER*

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The contribution of the roentgen ray to the diagnosis of gastric cancer makes a chapter of which the roentgenologic profession may well be proud. It is not exaggeration to say that 95 per cent of cancers give roentgenologic evidence of their presence. Often their early recognition can be thus revealed when they can not be discovered by other methods of examination. They can be differentiated with reasonable accuracy from various other lesions within and without the stomach; their site and extent can be shown and considerable information as to their operability can be obtained.

Pride in these achievements, however, should make roentgenologists only more ready to acknowledge the limitations of the roentgen examination. The roentgen ray does not compete with the microscope in making histologic diagnoses. It can only disclose the presence of a tumor, an ulcer, or a lesion of uncertain character. By experience it has been learned that nearly all neoplasms of the stomach are cancers and that ulcerous lesions of certain types are most often cancerous. To this extent, therefore, the roentgen diagnosis of gastric cancer is empirical. Further, by showing the location and extent of the cancer the roentgen ray is of valuable assistance in determining whether operation is feasible. This, of course, it can not accomplish alone with absolute finality.

PATHOLOGY

Most pathologists recognize three principal gross types of gastric cancers: the medullary, the scirrhous, and the mucoid or colloid. Medullary cancer is characterized by large, soft, lobulated or cauliflower-like masses projecting from the mucosa into the gastric lumen, but there is no tendency to general diminution of

*Read in Section on Radiology, Southern Medical Association, Fifteenth Annual Meeting, Hot Springs, Ark., Nov. 14-17, 1921.

gastric capacity by shrinking processes. Scirrhous cancer infiltrates the wall of the stomach with hard, dense tissue. Although the wall of the stomach is generally thickened, the neoplasm does not project markedly into the gastric cavity, but gives rise to marked contraction. With extensive involvement the stomach becomes a stiffened narrow tube. Mucoid, or colloid, cancer is related to the scirrhous form, but masses of gelatinous material instead of dense scirrhous tissue are found.

While hyperplasia and tumefaction with resulting intrusion on or shrinking of the gastric chamber are fundamental characteristics of cancer, an opposing factor, namely, ulceration, is also of common occurrence and may considerably alter these characteristics. Ulceration is most constant in the scirrhous type in which case it is likely to be extensive but shallow. In the polyp-like, medullary type, ulceration is generally less constant and less marked, but occasionally ulcerative sloughing of a soft cancer is so great that the lesion has the gross characteristics of an ulcer rather than of a new growth. Besides these frankly cancerous ulcers, there are ulcers which can not be distinguished grossly from benign ulcers, but which, under the microscope, show cancer cells in small number. In the roentgen diagnosis of gastric cancer, from an inclusive point of view, we are obliged, therefore, to take account not only of tumors, which are fortunately most common, but also of ulcers. Some of the latter plainly betray their malignancy under the roentgen ray. Others are open to suspicion, and still others can be identified only by the microscope.

TECHNIC

Roentgenologists employ various technical methods in the examination of the stomach. Some rely wholly or chiefly on roentgenograms, others on fluoroscopic findings. Some make use of the motor test meal, others do not. Each examiner is accustomed to his routine and is usually satisfied with the results. Our own technic is as follows:

In the morning, in lieu of breakfast, the patient is given 60 grams of thoroughly cooked cereal well mixed with 60 grams of barium sulphate, to which he is permitted to add a little sugar and milk (not cream). After eating this he is directed not to take other food, medicine or drink (except water as desired) until the examination is finished.

Six hours later he returns and is first examined fluoroscopically in the standing position. Male patients are stripped to the hips; women are allowed to wear a thin kimona without buttons. The examiner makes a rapid survey of the thorax, notes the advancement of the six-hour meal and whether any of it is retained in the stomach.

The patient is then given an aqueous suspension of barium consisting of 120 grams of barium sulphate, 4 grams of sodium bicarbonate and 10 c. c. of syrup of raspberry in 250 c. c. of water, the ingredients being stirred together by a mixing machine. As he drinks, the cardiac portion of the stomach is first carefully observed, then attention is directed to the entire stomach as it fills. When the patient has finished drinking, peristalsis is watched and if possible the progress of a wave is followed out to the pylorus. Then by manual pressure the barium ingesta are forced upward so that the cardiac end is well outlined. If the first portion of the duodenum is not adequately filled, the examiner presses the gastric contents in this direction until the duodenal bulb is satisfactorily demonstrated. The general form, outline, tone, position, mobility and flexibility of the stomach are all observed. The patient is turned at various angles so that any deformity of the gastric contour can be seen. If a lesion in the cardia is suspected but none found with the patient standing, he is also examined supine and prone on the trochoscope. After the screen examination, two or more plates are made with the patient prone on the cassette and with the tube at his back. In this combined method the roentgenoscopic test plays the leading role, but the roentgenograms are also of value for confirmation and for the demonstration of minute lesions which may elude detection on the screen. Before making the fluoroscopic examination, and to secure adaptation of vision to

darkness, the examiner should be in the darkened screen room for from fifteen to twenty minutes before beginning his work. This adaptation is maintained by the use of subdued illumination.

ROENTGENOLOGIC SIGNS OF CANCER

Filling defects.
Altered motility.
1. In nonobstructive cases.
   Exaggerated initial clearance, the gaping pylorus.
   Hypermotility of the six-hour meal.
2. In obstructive cases.
   Scanty or absent initial clearance.
   Six-hour retention.

Altered peristalsis.
   Absence of peristalsis from involved area.
   Weak peristalsis (in nonobstructive cases).
   Exaggerated, irregular peristalsis and antiperistalsis (in obstructive cases).
Lessened flexibility: in involved portion of gastric wall.
Lessened mobility: with extension of growth to tissues outside the stomach.
Alteration of size (capacity) of stomach.
   Shrinking (nonobstructive, scirrhous).
   Dilatation (of uninvolved portion of stomach above obstruction).
Persistent local spasm.
   Incisura opposite the lesion (occasional).
Displacement of stomach.
   Upward and to left by scirrhous cancer.
Meniscus sign of some ulcerating cancers.
Large niche ulcer (occasionally).

Consonant with its gross pathology the tumor-producing cancer of the stomach has for its chief and indispensable roentgenologic sign the filling defect. The tumor displaces the opaque medium and is seen in shadowed profile. Medullary cancer with its aggregated masses produces the most striking filling defects, especially those located on either curvature. Save for this infringement on its lumen the capacity of the stomach is not lessened and its general form is not materially changed. Scirrhous cancer and its congener, the mucoid, project less deeply into the gastric chamber. The filling defect is relatively narrow and smooth. Often scirrhous cancer involves the pyloric end of the stomach, completely encircling it and reducing its lumen to a spigot-like projection from the uninvolved portion. In some instances the entire stomach is shrunken to a mere tube.

When a cancer is located at a point along the course of the stomach between its extremities the filling defect caused by the thrust of the tumor or by its contraction results in an hour-glass form of stomach. Usually the canal joining the two segments is comparatively long and is often rather centrally placed; both of these features aid in differentiating the hour-glass of cancer from that of ulcer.

A filling defect due to cancer requires distinction from numerous simulants. It must be constant in form and situation, despite manipulation or the administration of antispasmodics. If it coincides with a palpable mass its genuineness is fairly established, but even in this instance an extrinsic growth must be excluded.

Besides the filling defect, cancer of the stomach may occasion numerous other phenomena of variable diagnostic worth. These include alterations of motility, peristalsis, mobility, flexibility, capacity and position.

Unless the growth mechanically obstructs gastric drainage, hypermotility commonly accompanies cancer. The barium meal flows voluminously and constantly through the gaping pylorus. The stomach is emptied with abnormal rapidity and in six hours the head of the meal is likely to be advanced far into the colon. On the other hand, with obstruction, which occurs in 60 per cent of the cases, emptying is retarded and marked retention from the six-hour meal may ensue.

Alterations of peristalsis by cancer vary widely, depending on the site and extent of the growth. In the nonobstructive cases peristaltic activity is generally diminished, and with an extensive involvement may be totally lacking. In the invaded area, whatever its extent, peristalsis is usually absent, although waves may be observed in the uninvolved por-

tion of the stomach. Obstructing cancer often gives rise to exaggerated peristalsis in the region above the growth. In such instances the waves are likely to be irregular in depth and sequence. Antiperistalsis is sometimes seen as a result of stenosis.

Mobility of the stomach is not impaired by cancer unless the growth has extended to adjacent tissues. Extensive invasion outside the stomach may manifestly lessen its palpatory movability, but this feature can not always be determined with assurance. On the other hand, diminution of flexibility of the gastric wall in the area invaded by the growth is often readily discoverable. Scirrhous cancers, especially, stiffen the wall so that it is not indented by the palpating fingers, but slips away with its contour unchanged.

Extensive scirrhous cancer markedly reduces the capacity of the stomach, sometimes to the extent that ingesta are backed up into the esophagus. Obstructing pyloric cancer often causes a notable dilatation of the proximal portion of the stomach.

Cancer occasionally induces a spastic contraction of the muscle fibers in its plane resembling the incisura of ulcer, although it is often broader than the ulcer-incisura.

DIFFERENTIAL DIAGNOSIS

Conditions other than cancer which may produce apparent filling defects include gas or fecal matter in the colon, secretion in the stomach, spasm, pressure against the spine, extrinsic tumors, ascites, ovarian cysts and pregnancy.

Deformity of the greater curvature by gas in the transverse colon or splenic flexure is seen so often and the cause is so manifest that it should never be mistaken for cancer.

Secretion pent up in the pyloric end of the stomach may obscure the antral region. It may be displaced by manipulation of the stomach or may escape through the pylorus and is not deceptive to the initiated observer.

Spasm, from causes outside the stomach, produces perhaps the most formidable simulants of true filling defects and may distort the gastric contour in a very eccentric manner. Not infrequently spasm erases the prepyloric portion of the stomach from view with a striking resemblance to cancer. Total gastrospasm may produce a narrow, shrunken stomach like that resulting from an extensive scirrhous cancer. Spastic filling defects sometimes show their true character by changing their form or situation. Again, they may persist unchanged for a considerable period. Absence of a palpable mass helps to identify them. Sometimes they can be effaced by massage. If due to fear, reassuring the patient will often cause them to disappear. Spasm may be absent at a second examination. It can usually be obliterated by full doses of belladonna.

Pressure of a normal or a deformed spine against the stomach occasionally disfigures the adjacent portion of the gastric outline. Strong retraction of the abdominal wall aids such distortion. Plates made with the patient prone often show it. Its nature should be evident at the roentgenoscopic examination. An extrinsic tumor intruding on the gastric contour produces a smooth, clear-cut defect, but the fact that the mass is outside the stomach can usually be established by palpatory manipulation. Artificial pneumoperitoneum may assist if the diagnosis is difficult.

Except as a result of previous operations, adhesions rather seldom produce deformities of the gastric outline simulating the filling defects caused by cancer. Rarely, inflammatory processes in the right upper quadrant distort the pyloric end of the stomach, but in the absence of a palpable mass the examiner is not likely to be deceived. Admitting occasional exceptions, I believe that in the past we have been inclined to overestimate the frequency of adhesions, their deforming effects, and their ease of demonstration. At any rate, in my own experience operation has often failed to show them when I had been confident of their presence, and vice versa.

Fluid, large intra-abdominal cysts, and advanced pregnancy lift up and narrow the stomach. Such factors should be obvious.

Ulcer at the pyloric end of the stomach, unless it cause a characteristic niche, is hard to distinguish from cancer. Often we can only make the diagnosis of "lesion at the outlet." Again, while a very small prepyloric ulcer on the lesser curvature may manifest a pathognomonic niche, a far more extensive cancer in the antral region may give only slight or uncertain evidences of its presence. It follows that the examination of this part of the stomach should be painstakingly thorough.

When simulants have been excluded and the existence of a tumorous lesion in the stomach is confirmed, the diagnosis of gastric cancer is relatively, but not absolutely, certain. Exceptionally the mass may be a hairball, a syphilitic lesion or a benign tumor. Hairball makes a palpable tumor and a central reticular filling defect, but the gastric outline is preserved. Sometimes a hairball can be displaced upward into the gas-bubble and thus be seen more clearly. Syphilitic infiltrations and benign tumors are indistinguishable from cancer roentgenologically. All these lesions are rare.

CARCINOMATOUS ULCERS

One variety of ulcerating cancer exhibits roentgenologic characteristics which I consider pathognomonic and which I have recently described. In this type the ulcer has overhanging margins, but lies wholly within the tumor and does not cause a niche projecting from the gastric lumen, thus distinguishing it from benign penetrating ulcer. On the plate it may be completely hidden by the barium so that palpatory roentgenoscopy is requisite to determine its presence. If the lesion is on or near the lesser curvature above the incisura angularis the crater is revealed by palpation as a dark meniscus seen in profile with its convexity toward the gastric wall. If it is on the posterior wall stroking pressure over the stomach shows the crater as a more or less oval dark shadow surrounded by a lighter zone. If it saddles the lesser curvature in the pyloric portion of the stomach a meniscus is seen, but with its concavity outward. All such lesions that I have seen have proved, at operation, to be cancers. Ulcers of the niche type with a diameter of 2.5 cm. or more are usually, but not always, cancerous. Occasionally smaller ulcers of the niche type show cancer cells microscopically, but they can not be distinguished by the roentgen ray from benign ulcers.

EARLY DIAGNOSIS

Since operation offers the only hope of cure, it is of the utmost importance that the diagnosis be made early and before the lesion has become inoperable. The earliest stage at which the condition can be recognized by the roentgen ray depends on varying circumstances. Among these are the size of the lesion, its situation, its character, the thoroughness of the examination, and the examiner's keenness of observation and judgment. Very small lesions on either curvature are susceptible of demonstration, and I have occasionally been able to discover them in various parts of the stomach at a very early stage. Cancers high in the cardia may escape detection unless a screen examination is made with the patient recumbent. Growths on the posterior or anterior wall require careful palpatory fluoroscopy with views at various angles. Nonobstructive lesions in the pyloric portion of the stomach, unless they deform one or the other curvature, are sometimes peculiarly hard to find.

Like every other diagnostic test, the roentgen ray is not infallible. Sometimes it overlooks; sometimes it misinterprets. Notwithstanding these difficulties and occasional lapses, the roentgen ray will usually discover cancer as early as the patient's symptoms drive him to seek medical advice.

I would particularly stress the fact that the roentgen ray will show a cancer earlier than will the most thorough clinical examination. This is not said in disparagement of clinicians. But cancer is insidious in onset and its diagnostic clinical signs occur relatively late in the disease. The service of the roentgen ray is increasingly invoked and improves constantly in efficiency. It deserves to be rated as an indispensable part of a routine examination. While an unqualified diagnosis of cancer often can not be made by the roentgen ray, it will usually indi-

cate the presence of a lesion worthy of exploration, and this at a time when surgery may be of some avail. It is regrettable that under present conditions not more than 50 per cent of these cancers are operable when discovered, so that there is still a wide field for improvement. Especially reprehensible is overcautious waiting until an exact diagnosis can be made, for this has deprived many patients of possible surgical benefit.

OPERABILITY

The feasibility of operation in a given case of gastric cancer depends on many factors apart from those disclosed by the roentgen ray. Among these are the skill of the operator, the general condition of the patient, and the presence or absence of metastasis in regions where it can not be discovered roentgenologically. Yet, by showing the situation and probable extent of the neoplasm, the roentgen ray furnishes data which should be considered in deciding the question of operation.

From the standpoint of the situation of the growth we can place its relative operability in one of three groups: operable, borderline, and inoperable. Grossly, these groups correspond respectively to the pyloric, median and cardiac portions of the stomach.

Tumors which are confined to the pyloric third of the stomach or have not spread far into the pars media are resectable if other conditions are favorable. Seventy per cent of the cancers originate in this part of the stomach, but by no means are all of these operable when discovered.

Cancer in the median section of the stomach is in the questionable zone. Other things being equal, operability is inversely proportionate to the upward invasion of the growth. However, its resectability depends not only on its upper limit, but also on the size and position of the stomach. A small stomach lying high under the costal arch makes resection difficult, while a dilated or pendulous stomach with a cancer of the same anatomical situation and extent is more easily operable.

Further, in estimating the extent of cancerous invasion from its roentgenologic shadow the character of the growth must be considered. The actual extent of a medullary cancer corresponds closely to that seen in the roentgenogram. Scirrhous cancer infiltrates the gastric wall considerably beyond its apparent limits and a liberal allowance should be made for this excess.

Cancers of the cardia are usually inaccessible to operation, so that a well-established diagnosis of cancer in this zone negates intervention. Here the roentgen ray records with most emphasis, but not always without error, for the diagnosis may be wrong.

Fixation of the stomach, since it points to extragastric involvement, diminishes the chance of operative success, but it does not absolutely contraindicate intervention, neither can its presence be confirmed nor excluded with accuracy by the roentgen ray.

Metastasis to the lungs or bones can be shown by the roentgen ray and metastatic nodules in the periphery of the liver may sometimes be demonstrated by pneumoperitoneum. Such conditions obviously forbid surgery. Metastasis elsewhere is not roentgenologically demonstrable. Clinical examination may show metastasis to the rectal shelf, supraclavicular glands, skin, or umbilicus, or reveal the presence of ascites and thus prevent useless operation.

On the whole, while the roentgen ray will often indicate the probable operability or inoperability of cancer, the question of operation should be weighed carefully after a correlation of all the findings. While the patient should be spared needless exploration, he is entitled to all reasonable chances of benefit.

DISCUSSION

Dr. A. L. Gray, Richmond, Va.—Dr. Carman is so skilled in this type of work that one must be somewhat intrepid to differ with him or even to add to what he has said. As he went along I have made one or two notes of questions I wanted to discuss with him. One was the adoption of a technic in the study of the gastrointestinal tract, particularly the stomach. We recognize the necessity in a clinic even much smaller than Dr. Carman's clinic of administering a double meal. I can not convince myself that a double meal is better than a single meal. While in some of the clinics with which I am connected we have to resort to a double meal,

in my private work I always use a single meal, and I do so for this reason: I always like to fluoroscope a patient before any barium has been given at all. I like to examine the chest as well as the abdomen. I have picked up gallstones and urinary calculi which I am certain would have escaped me if I had not done this.

The medium for administering the barium is a question, I think, largely of personal preference. Dr. Carman uses gruel impregnated with barium as his motor meal. I use Bulgarian buttermilk whenever I can. Dr. Carman follows his motor meal with his fluid meal. I try to make one meal take the place of two. Whatever we use and become accustomed to enables us to know what the stomach should do with that particular meal better than if we switched from one to another.

Dr. Carman is wonderfully skilled in filling the duodenal bulb by putting his hand on the anterior abdominal wall. Sometimes I can do it, but again I can not. However, I examine my patients in the upright posture, and after watching the barium enter the cardiac end of the stomach. I then examine the esophagus as more of the meal is swallowed. I think I have been able to pick up things in the esophagus that I would not have done otherwise, especially in cases that were not suspected by the physician and in which I was not asked to examine the esophagus. After the upright examination is made fluoroscopically, I place the patient in the horizontal position. As you know, the stomach slopes downward and forward, and when you place a patient in the dorsal position the cardiac end of a normal stomach fills up smoothly and empties more or less the distal half of the stomach. As a routine we rotate the patient to the left side and in this way get a view of the anterior and posterior walls. Then gradually turn the patient toward the right and pour the liquid meal from the cardiac end into the pyloric end and continue the rotation, examining the patient [illegible] with the fluoroscope. Of course, Dr. Carman rotates his patients and examines them in the upright posture. I then turn the patient on the abdomen, using a little device, which I shall not steal from my paper of this afternoon, to prevent a filling defect so often seen where the stomach and spine cross. Then I find that I can get the duodenal bulb better than in any other position.

I want to ask Dr. Carman to what he attributes the frequent presence of the very sharp, small incisura often seen near the pyloric end on the lesser curvature. This has been attributed to adhesions and to spasms. Personally, I think it is just a visceral fold. I would like to know his opinion.

I would like to ask Dr. Carman also about the cause of the greater curvature defect in the slide which he showed. The appearance was very similar to a general carcinomatosis of that part. Of course, we all see the great irregularity that occurs sometimes on the greater curvature and we attach very little importance to it because at times we can make those things disappear. I attribute it to rugae of various kinds. In that particular slide I wonder if he thought they were rugae?

Dr. Allan Eustis, New Orleans, La.—I have quite a number of discussions with my radiologists as to the small cow-horn stomach. They insist that it is pathognomonic of lues of the stomach.

Another thing, I would like to ask the nature of the lesion in the two cases of syphilis of the stomach which he showed. Was it gumma or was it a general librosis of the stomach walls?

Dr. H. M. Simpson, Florence, Ala.—I have been using in my gastro-intestinal work the single meal. I have not satisfied myself as to the normal emptying time of buttermilk and barium. It seems to me it must be shorter than that of gruel. I would like to ask whether Dr. Carman thinks the significance of the six-hour residue applies to the buttermilk meal and what the time limit should be for this meal?

Dr. James J. Clark, Atlanta, Ga.—I would like to ask Dr. Carman if the motor meal he gives first is for convenience in order not to have the patient in the x-ray laboratory so often, or if he really prefers it. I use both types. I prefer to give the meal in the morning, studying the stomach at that time. At Emory University Clinic I am unable to see the patients in the morning, so I give the cereal meal and see them in the afternoon, at this time refilling the stomach. Is the motor meal used for its convenience or is it really more advantageous?

Dr. Carman (closing).—The six-hour meal, as we use it, is an entirely different thing from that used elsewhere. Many roentgenologists start the examination with the meal and then have the patient come back at the end of six hours. With this technic, the time limit would have to correspond to the composition of the meal to be of any value. The six-hour time limit was worked out with barium, not bismuth, in a cereal meal. Barium leaves the stomach earlier than bismuth; carbohydrates earlier than proteins.

A six-hour gastric retention from this bariumized cereal meal usually signifies a gastric or duodenal lesion, but we do not make a diagnosis from the retention alone. A six-hour retention in a large but otherwise normal stomach showing hyperperistalsis is just as diagnostic of duodenal ulcer as bulbar deformity, and we make the diagnosis of 25 or 30 per cent of our duodenal ulcers from this syndrome. In the absence of a six-hour retention, we do not consider hyperperistalsis in a large stomach as diagnostic, although it occurs in 50 per cent of the cases with definite lesions of the gall-bladder.

The meal, as we use it, is convenient both for examiner and patient. The patient is first merely given the meal and he does not have to undress. Six hours later he returns and we make the roentgenoscopic examination, noting whether the stomach has emptied or not. From a diagnostic standpoint it makes no difference where the meal is beyond the stomach or whether it leaves the stomach in one hour or five. That feature may be of physiologic interest, but has no diagnostic significance.

We have found that 95 per cent of the cases with six-hour retention show a lesion in the stomach, duodenum or upper small bowel. In the remaining 5 per cent the patient has misun-

derstood the nurse and has taken additional food or has developed a sick headache.

Dr. Gray spoke of various other abdominal conditions. All of our patients are first seen by a clinician and the particular examination for which they are sent to us is specified, such as esophagus, stomach, colon, and so on. In a private laboratory I would probably do as Dr. Gray does.

We often see the incisura on the lesser curvature just above the pylorus as mentioned by Dr. Gray. I do not know what produces them, and have found nothing definite about them in the literature. Our surgeons have found nothing to explain them and they have no pathologic significance that I know of.

The steer-horn stomach has not been a characteristic finding in the cases of gastric lues that I have seen.

TREATMENT OF ACNE

By Cosby Swanson, M.D.,
Atlanta, Ga.

The treatment of acne, as a rule, has always been very unsatisfactory, as evidenced by the unnumbered methods advocated for its eradication. Much doubt has been expressed as to the ability to effect a cure, and this attitude has led the layman to be exceedingly skeptical as to the results of treatment. I believe this accounts for the many failures of co-operation on the part of acne patients.

In dermatological practice acne vulgaris is one of the most common diseases met with. The comedones, papular and pustular lesions which characterize this disease make diagnosis easy. The disease may occur in acute form under special aggravation, but it is usually chronic. It is most common on the face where it often conspicuously disfigures the patient, but it is frequently seen on the chest, shoulders and back. Acne is most common between the ages of twelve and twenty-five.

Various conditions have been charged directly to the causation of acne, yet no one has been able to reduce his belief to a common basis. That acne bacillus is found in nearly every skin and may rest harmlessly in the sebaceous glands until conditions are favorable for its development, has long been demonstrated.

For acne to develop a predisposing cause is necessary. Acne patients as a rule have an oily "seborrheic skin" which oozes sebaceous secretions. This type of skin is due to physiologic expression of endocrine imbalance. The appearance of acne at the beginning of puberty also points strongly to a deranged endocrine mechanism as the primary, predisposing cause.

In the majority of cases conditions other than acne are present which make one more predisposed to this disease. In reviewing the histories of 1,020 private cases of acne which I have treated in the past ten years, the following percentages show some of the conditions found in these cases: 50 per cent, aggravated form of seborrhea of scalp; 45 per cent, constipation; 42 per cent, some form of gastro-intestinal trouble; 40 per cent, diseased and enlarged tonsils; 22 per cent, infected teeth and gums; 8 per cent, other skin diseases; 7 per cent, so-called "rheumatism;" 5 per cent, painful menstruation; 1½ per cent, syphilis; 1 per cent, nephritis; three-fourths of 1 per cent, pulmonary tuberculosis; one-half of 1 per cent, malaria; two-tenths of 1 per cent, enlarged thyroid.

In treating acne each patient has to be dealt with according to symptoms present. Both internal and external medication are of importance, also strict attention to personal hygiene and habits. The value of exercise in the open air can not be overestimated.

In treating acne patients with an aggravated form of seborrhea of the scalp, it would be useless to treat the face and leave the scalp untreated and achieve satisfactory results. To remove successfully seborrhea of the scalp systematic shampooing and the daily application of scalp lotion is necessary.

Removal of diseased and enlarged tonsils goes far in contributing to the successful treatment of acne, as any local infection that lowers body resistance contributes much to the development of this dis-

ease. I find that a careful examination of the teeth is necessary in all patients, as the source of the commonest contributory cause may often be traced to abscessed teeth and infected gums.

When there is not a free menstrual discharge the retention causes a great deal of systemic disturbance. I notice that with patients in this class the acne is more aggravated at the menstrual period; such treatment as is necessary to relieve this condition should be given.

Constipation should be given careful attention. Often this condition can be relieved by regulating the habits and diet of the patient. Patients with symptoms tending to deranged internal gland secretions must be dealt with in an intelligent manner. In some cases thyroid extract, in some ovarian extract in the female and testicular in the male, may be valuable in clearing up obstinate cases of acne. When internal gland secretion is better understood I am of the opinion that this method of treatment will prove to be of great value.

Too much emphasis can not be laid on the importance of repeated analysis of urine, otherwise we should be ignoring a fundamental factor in our problem. Few realize what an accurate indicator the urine is to the way in which the metabolism of the body is performed. By these tests we learn the manner in which the nutritive processes of the body are carried on. Many cases of acne are aggravated by intestinal putrefaction. Careful examination of the urine will often afford intelligent indications for treatment. When the urine is highly acid with an excess quantity of indican, alkalies, intestinal antiseptics and a non-fermentative diet are very important parts of treatment.

The diet of an acne patient should be rigidly supervised. I find that any food that increases the sugar content of the blood or causes intestinal fermentation should be eliminated from the diet of the patient. The articles I usually eliminate are all sweets, highly spiced food, hot bread, greasy food, excess of carbohydrates, and I instruct the patient to eat only at meal time, masticate food thoroughly and drink an abundance of pure water. With the majority of patients diet is a hard problem, but it is necessary to insist on a strict dietary regimen in all cases.

For many years acne vaccine, both the stock and autogenous, has been given with very unsatisfactory results. Personally I have almost abandoned vaccines, finding they bring to naught the best intentional efforts. Pustules will often disappear after using vaccines to recur in much more aggravated form a short time after it has been discontinued. Theoretically, acne vaccines should be of value. Clinically, they have proved a sad disappointment. Acne vaccines have been discontinued by the majority of physicians. A few remaining advocates of vaccine are commercial laboratories and physicians who have had a very limited experience in the treatment of this disease.

The importance of local treatment is not to be depreciated. The removal of comedones, also the breaking and evacuating of pustules is advisable. External applications such as lotions, ointments, powders containing principally sulphur and resorcin are most commonly prescribed. The remedial applications vary in strength and character with local condition. In the average patient where the eruption has existed for some time lotions of a stimulating character are usually necessary. When irritation or a tendency to scaliness results the lotion is omitted and a soothing application substituted.

I find that x-ray gives the most lasting and beneficial results in the treatment of acne. X-ray treatment is painless and administered without any discomfort or inconvenience to the patient.

I would now be reluctant to treat an acne patient without it. In the past two years I have treated forty cases with x-ray. Results were very satisfactory in all cases, more so than in cases where x-ray was not used. Some of these cases responded with most gratifying results

after a few exposures, the majority of cases showing good results after the third or fourth treatment. Several of the most severe cases showed the most striking improvement.

It is a well known fact that x-ray changes tissue so that it has more resistance to all pyogenic and parasitic organisms. The cells of the sebaceous glands offer less resistance to x-ray than other structures of the skin. In acne the sebaceous glands are the structures of the skin primarily involved and the effect of x-ray is due largely to the effect it has on these glands.

X-ray should be used in sufficient amount to decrease the size and activity of the sebaceous glands without affecting the texture of the skin. X-ray, when administered in correct dosage, will change an oily seborrheic skin to a normal skin. The quantity of x-ray I usually give is one-fourth skin unit every seven days for five or six exposures, then every two weeks until five or six more exposures have been given. This is necessary in order to get permanent results. When given too frequently or in too large a dosage, x-ray will often cause a permanent dryness of the skin, or if treatment is extended over a long period it will, in some cases, tend to produce an atrophic wrinkled condition of the skin. For this reason it is always best to proceed cautiously with treatment and avoid over-dosage. Since the development of the Coolidge tube and modern methods of administering x-ray the dosage can be measured with as much accuracy as any other powerful agent.

When exposures are given on the cheeks the eyes should be screened with lead foil, also the hair when forehead exposures are given. Although acne is a stubborn disease, from my personal experience I believe that with the application of the foregoing principles and the use of x-ray splendid results can be achieved in the majority of cases.

436 *Peachtree Street.*

TROPICAL DISEASES AND PUBLIC HEALTH

MALARIA CONTROL*

By John M. Swan, M.D.,
Rochester, N. Y.

The problems that have interested us since the foundation of the Society are the problems that interest you as practitioners in the Southern portion of the United States. Your land is not situated within the tropics, but the entire United States south of the thirty-ninth parallel of latitude has a subtropical climate and is exposed, and will be more and more exposed as commerce increases, to all the tropical epidemic diseases. Indeed Baltimore, Philadelphia and New York have had epidemics of yellow fever and are open to plague, or would be were it not for that efficiently watchful sentinel, the United States Public Health Service. The problem which these diseases present, however, is spasmodic, and even in cities as far south as New Orleans and Galveston, not urgent. Malaria, on the other hand, is a constant menace not only in the tropics but also in all subtropical climates and in many communities within the temperate zone.

It is impossible to estimate the economic loss due to malaria; but it is appallingly large. In the Anderson-Cottonwood irrigation district in Shasta County, California, Gray found that approximately one-half the population had malaria in 1918. The total cost to the district was estimated at $10,400, or $31.70 per family; $14.05 per sick person, or $7.66 per person. The estimate did not take into account the deaths, the labor loss among casual workers, losses due to inability to handle crops at the proper time, losses due to vacant property or losses due to depreciation of property. Large as it is, it might be accepted and the progress of the communities in which it is present would continue, thanks to the ability of the human will to overcome obstacles. The loss is, however, preventable. Since the discovery of the plasmodium by Laveran, in 1880, the researches of the host of malaria students, among whom four former Presidents of this Society—Gorgas, Thayer, Craig and Bass—occupy illustrious positions, have made the facts of the etiology, pathology, clinical course, diagnosis, treatment and prophylaxis of malaria matters of common knowledge. Malaria is a disease the course of which is known and is easy of detection; the treatment of which is, in the great majority of cases, simple; the prevention of which has been repeatedly demonstrated to be possible, and the eradication of which has been repeatedly successfully attempted. Therefore, the control of this infection is a goal eminently worth striving for. There are four factors in the campaign for malaria control that will occupy the attention of those engaged in the work: (1) the reporting of cases in the acute stage of the disease to the health authorities; (2) the treatment of patients in the acute stage of the infection; (3) the detection and treatment of carriers; (4) the destruction of anopheles mosquitoes, not only as adult insects, but also by abolishing their breeding places.

The first essential in the reporting of acute cases of malaria is to have an accurate diagnosis. To this end every physician who practices in a malarial country should be able to stain a specimen of blood for the plasmodium and to recognize the organism in the stained specimen. It will no longer suffice for a diagnosis to be made merely because the patient has fever. A recent writer in the *Journal of Tropical Medicine and Hygiene* says:

> "Fever is such a commonplace of tropical practice that it does not always receive the attention that it deserves. Malaria is considered a safe diagnosis for any fever which is not acute and the origin of which is uncertain,"

and Leathers has said that at least 25 per cent of the diagnoses of infectious disease are incorrect.

It has been said, and it undoubtedly will be said, that it will be impossible to

*President's Address, American Society of Tropical Medicine, Seventeenth Annual Meeting, held conjointly with the Southern Medical Association, Hot Springs, Ark., Nov. 14-17, 1921.

have cases of malaria in the acute stage of the disease reported, and that it will be impossible to get an accurate report of carriers. Such statements have been made about every disease that is now reported as a matter of course, including gonorrhea and syphilis. It is not impossible to obtain reports, and accurate reports, of any disease once the attempt is made in earnest.

The treatment of the acute attack of malaria is comparatively simple. It is known that quinin in solution in the blood serum will kill the plasmodium in its sporulating stage on account of its property as a protoplasmic poison. The difficulty in the treatment arises from the fact that the plasmodium reproduces by two methods: the asexual and the sexual. It is the sexual form of the organism, the gametocyte, that escapes destruction by quinin. It is this form of the parasite that is retained in the capillary blood spaces of the bone marrow and the spleen, perhaps of the liver, and possibly of the other viscera, which later assumes the asexual method of reproduction and produces the clinical relapses. It is for the destruction of these forms, these gametocytes, that the treatment has been too frequently prematurely discontinued. The standard treatment of malaria developed by Bass and his co-workers is to be recommended as the method for destroying the plasmodium in its human host, sporocyte and gametocyte, and so relieving the community of its carriers.

In relation to the problem of the carrier it must be remembered that children are subject to malaria, as are adults, and that the disease occurs also in infants. Two cases of tertian malaria in infants under six months of age were reported by Bloom in 1918. A parallel may be drawn between this disease and yellow fever, which is propagated in its endemic foci by cases in children; in whom its manifestations are usually irregular.

A great deal has been written about the destruction of anopheles mosquitoes. It can be done, and it has been done. In 1915 I referred in a paper read at the meeting of this Society held in San Francisco to the work of Ross in Mauritius. Ross estimated that for an expenditure of 0.36 rupee, or about 11.6 cents, per head of population per annum a place like Mauritius should expect to have its malaria morbidity and mortality very much reduced. In the last six years the cost of everything has increased. Recent work in the Southern states has been done at a cost of 80 to 85 cents per capita. This cost includes the original outlay for drainage, which will not reappear in the continuation of the work for subsequent years and which might properly be charged to general agricultural improvement. Gray, in the paper already referred to, estimates that in the district in which his study was made a charge of $31,000.00 might be expected for the various control measures for a three-year period; but he adds that $12,000.00 of this should be deducted for agricultural drainage and should not be charged against malarial prophylaxis. Then he adds:

"These figures show and the experience of other districts proves that it is economically cheaper to control malaria than to suffer from it."

So that for three years an outlay of $19,000.00 for malarial prophylaxis with an annual expenditure of $3,800.00 after that would almost rid of malaria an area of 32,000 acres with a population of 1,300. The United States Public Health Service, the International Health Board, and the health authorities of ten Southern states are at present engaged in an attack on the malaria problem which I have no doubt will eventually result in the reduction of malaria to its very lowest point, if it does not abolish it. The organization within the United States Public Health Service is known as the Malaria Field Investigations Committee with headquarters at Memphis, Tenn., directed by Surgeon L. D. Fricks, assisted by Dr. M. A. Barber and Senior Sanitary Engineer J. A. LePrince. The following problems are now engaging the attention of this organization: the longevity of anopheles mosquitoes; the viability of malaria parasites in mosquitoes; the blood picture of malaria; the relation of domestic animals to the transmission of malaria; observations on the dispersion of anopheline mosquitoes; winter activities of anopheline mosquitoes; observations relative to early seasonal transmission of malaria; observations on seasonal prevalence of dif-

ferent anopheles species; larvicide experiments; rice field investigations.

In 1920 a total area of 192 square miles was under control with a population of almost 200,000. This year malaria surveys have been made in 118 urban communities in ten different states, and from these surveys 25 towns have been selected for new malaria control demonstrations; an area of 75 square miles with a population of 70,000. Furthermore, investigations are being made as to the possibilities of malaria control in rural districts in Virginia, North Carolina, Georgia and Alabama, the county being used as the unit in which to work.

The medical departments of the Army and Navy are engaged in the same work in the more restricted fields furnished by their individual responsibilities. It seems to me that we may look forward to the time when malaria in the continental United States will be under control.

South of the United States, between the Tropic of Cancer and the Tropic of Capricorn, there lie the countries of Central America, of South America, and of the West Indies. The sanitary problems in these countries must be solved before the commercial, agricultural, engineering and mining enterprises can succeed. It seems to me that this is the field for the future endeavor of our country; not in the sense of exploitation, but in the sense of constructive co-operation. It appears to me that there is urgent need for the establishment in the United States of a clearing house for the problems of the tropics: an institute in which physicians and nurses may be instructed in the problems that they will meet in the tropics and from which they may be supplied to the administrative areas in which they are needed; in which physicians returning from the field, where they have had time only for the application of information already at their disposal, may learn of new facts and new methods for the application of old facts; in which the questions arising in the field may be sorted out and distributed for solution to various co-operating organizations, pathological and bacteriological laboratories, botanical and zoological laboratories, parasitological laboratories both for plants and animals, and entomological laboratories and other scientific workshops; from which information may be sent to the field; in short, a regulating center for the entire range of tropical questions. Such an institute ought to interest the 29,000 physicians in the Southern states and all those who have interests in the tropics, as well as the scientists and business men of the tropical portion of the Western Hemisphere.

Within the next few years we may expect to see the inauguration of the Gorgas Memorial Institute, which will serve as a stimulus to the study of the problems of tropical medicine in this hemisphere. The Republic of Panama, through its President, Dr. Porras, has contributed the site for the Institute and proposes to contribute a large sum of money for construction and equipment. The Institute will be erected on the Bay near the new Santo Tomas Hospital. Articles of incorporation have been approved by the President of Panama and a charter, which will be registered in Panama, has been granted under the laws of the State of Delaware. It is proposed to secure an endowment fund of $5,000,000. Among the Trustees of the Institute are the Surgeon-General of the Army, the Surgeon-General of the Navy, the Surgeon-General of the Public Health Service, Rear-Admiral Braisted, M.C., U. S. Navy, retired, Mr. John Bassett Moore, the President of the Republic of Panama, the Minister of Public Health of the Republic of Panama, Dr. Franklin Martin, and Dr. Leo S. Rowe.

It is interesting to know that the Trustees of the Boston City Hospital have recently authorized the organization of a service for the diagnosis and treatment of cases of tropical diseases, including certain parasitic and infectious diseases rarely seen in Boston and more common in foreign countries. This service is to be directed by Dr. George Cheever Shattuck, who will assume the duties of Assistant Professor of Tropical Medicine at the Harvard Medical School. The Broad Street Hospital in New York City has also organized a service with instruction for ship physicians.

Another way in which the problem of instruction might be handled is for three

or four of the smaller medical schools to combine forces and employ a man who would spend a portion of the time of each college year in the instruction of the senior class in each of the colleges of the group. Two months in each of four schools, with daily lectures, demonstrations and ward visits ought to be productive of good results.

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THE RELATION OF BACTERIAL COUNT IN MILK TO DISEASES IN CHILDREN CONSUMING IT*

By J. Ross Snyder, M.D.,
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Because bacteria are found high up in her teat canals, it is practically impossible to secure sterile milk from the cow. However, it is during the process of milking that gross contamination is most likely to occur from the udders and body of the cow, from the hands, body and clothing of the milker, from flies, from the dust of the barn, and from the pail. Unless intelligent and diligent precautions are taken, dirt in great quantities falls into the milk. Strainers, cans, machinery, bottles and caps can add still more to the contamination. The dirt in the milk is made up of hair and epithelia (bovine and human), dust, chaff, flies, etc., but the bulk of it is just ordinary and sometimes extraordinary cow dung. Bacteria-laden are these foreign substances. Many of them find milk a suitable medium for multiplication. Every time the milk is handled in its journey from dairy to consumer, the danger of contamination is renewed. Even without additional sullying, the time intervening may render dangerously potent the bacteria which started with the milk at its source.

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Many factors contribute to the difficulty of keeping milk clean and wholesome. Those who realize how extreme is this difficulty and who are acquainted with the loose methods in vogue in many dairies are prepared to accept without question the statement of Rosenau: "Milk is responsible for more sickness and death than perhaps all other foods combined."

The cow herself is one of the chief factors contributing to the difficulty of keeping milk clean. The cow is an animal of unclean and indecent habits. She pollutes her own bedding. She enjoys caking her hide with her own and her neighbor's dung. She neither sweats nor bathes, but delights to lick her own and her neighbor's dirty coat. Her tail has a far reach and its activities scatter her filth wide and near. Though a gourmand she is incapable of selecting wholesome food. Frequently she consumes noxious weeds and other poisonous substances, which sicken and scour her so that her milk becomes rank and unfit. Her coat is a rendezvous for flies, and innumerable parasites delve in her hide. She exercises no control over her sphincters and at the milking she invariably lets down more than just milk. She possesses low intelligence and she shows little affection. She exhibits neither grace of outline nor beauty of conduct. She neither looks good, nor acts good, nor smells good! She is nymphomanous. She eats her own afterbirth. It speaks well for human nature that man does not love his cow as he does his horse or his dog.

The cow, moreover, is a treacherous animal. Apparently in health and in pink of condition she may harbor disease to which man is susceptible. She furnishes a food so deceptive in physical properties that it can carry adulterants, filth and disease without arousing the suspicion of eye or of smell or of taste. It takes a particularly strong nature to remain undemoralized and uncontaminated in the presence of this unlovely creature. No one should be surprised that there are many ignorant, dirty and dishonest dairymen.

A certain amount of dirt that gets into milk is soluble. Removing, therefore, the insoluble matter by straining, filtering

and centrifuging does not make the milk clean. Frequently, however, by the time the milk reaches the consumer a visible sediment has settled to the bottom of the bottle. Whether this sediment is apparent or not, the rich, cowy flavor in the milk so enjoyable to some people is in proportion to its fecal content. People are peculiar in their tastes. Newspaper dispatches recently related how a scientist lost in the woods preferred starvation rather than eat raw rabbit meat. The probability is had it been offered, this man would have gulped without qualm or question a bottle of milk. Personally the choice would be for raw rabbit meat rather than milk of unknown quality. It is an unfortunate thing that so far no substitute for milk as a food has been found. For infants deprived of breast milk, cows' milk is essential. For older children it is little less essential. For invalids and for old people it is almost necessary. The writer is thankful that he belongs in none of these classes and he expresses the hope that before either of the latter classes has been reached by him, Henry Ford's cowless milk shall have been discovered!

Do I regard it as impossible to obtain clean milk? Yes, for the bulk of our population it is impossible and so it will remain until our people generally learn the relative value of things.

At the time this paper is being written, the Legislature of the State of Louisiana is in session. The City Health Officer of New Orleans estimates that the citizens of New Orleans are paying $1,000.00 per day for water added to the milk supply. This means that there are hundreds of children being robbed of nutrition. It means that there are many dishonest dairymen connected with the milk supply to the city of New Orleans. Every dishonest dairyman is a potential disease and death spreader. The City Health Officer prays the Legislature to enact a law which will impose not merely a fine but imprisonment on any dairyman found guilty of watering his milk. The august law-makers pay him no heed, but concern themselves only in the outcome of what, after all, is probably merely a battle between opposing factions for political supremacy.

The Legislature of the State of Alabama is in extra session. In a lengthy message to this body the Governor, at the insistence of the State Health Officer, incorporates a few words praying the appropriation of state funds for the benefit of certain communities which are endangered by contaminated water supplies and which are too poor of themselves to effect a betterment in their condition. The mighty intellects ignore the warning of the health officer and engage in heated debate as to whether it will destroy the health and the morals of the people of this great commonwealth to permit the sale of a beverage which is non-intoxicating, non-alcoholic, and which violates not a single provision of the Volstead act. It is decided, for the present at least, to allow the people to drink typhoid bacilli *ad lib*, but not one drop of anything which even by the stretch of poetic imagination might look or smell or taste like beer!

Democracies even shall fail when their peoples do not comprehend the relative value of things and when their law-making bodies are permitted to enact destructive measures out of all proportion to constructive measures. This Section and the Association of which it is a part will not perform their proper functions unless they push the fight for pure food and clean water with astuteness, determination and earnestness sufficient to make legislatures fear to deny laws favoring these.

Before such a fight can be successfully waged, however, we must reach agreement as to what measures should be advanced for this purpose. The value of the bacteria count on the milk supply has been frequently discredited in courts by the points which have been honestly raised against its exactness by bacteriologists, but which have been seized upon quickly by lawyers in their defense of dirty dairymen. The practice of counting the bacteria in milk is modern. Until quite recently nearly every laboratory that attempted this procedure used its own method in regard to media, technic and interpretations. Naturally wide discrepancies followed in results when the

same milk even was submitted to different laboratories. But this condition no longer pertains. The American Public Health Association has so standardized methods for the bacteriological analysis of milk, and the number of workers familiar with these standards has so rapidly increased, that results are now satisfactorily uniform.

The objections which are now most frequently heard against the value of the bacteria count are: (1) that it does not determine the kind of bacteria present in the milk; and (2) that it does not distinguish between animal dirt which is regarded as being comparatively harmless and human dirt which is regarded as being more dangerous.

From the entire milk supply of the whole country a few cases can be cited in which a milk of low bacteria count has been proven guilty of carrying specific disease. The men who harp on this will probably also deny Heaven because Lucifer fell! It is granted that a milk with a high count may not contain a single specific disease germ. On the other hand, it is an almost invariable rule whenever the records are studied in municipalities conducting methodical bacteria counts on the milk supply to find milk-borne diseases following the trail of the milk with the high count. Statistics may be needed to substantiate this fact in court, but here it ought to be general knowledge. Here it ought to be admitted that it is about a hundred to one shot that milk-borne diseases will follow the trail of the milk with the high count.

The fellows amongst us who are forever talking about "the harmless" bacteria in milk, who insist on drawing such a nice(?) distinction between animal dirt and human dirt, and who mitigate the danger of the transmission of animal diseases by milk, make me tired. They leave out of the consideration the thousands and thousands of babies that are made sick by an overwhelming number of these so-called harmless bacteria. Denied the mercy of a swift acting infection, many of these babies pale and pine, languish and linger, starve and suffer through days and nights until death comes from exhaustion! If you are a cheesemaker, keep on lauding these "harmless" bacteria in milk, but if you are a doctor in the name of these poor babies, I beg of you to shut up!

Because temperature and age have a great influence upon the number of bacteria in the milk, it is claimed that there is no real value attached to the count as an indicator of dirty dairying unless plating is done at the source. Unquestionably it is desirable at times to know just which factor or combination of factors is responsible for the high count, and when a high count occurs with frequency sufficient to arouse suspicion this can be done before prosecutions ensue or licenses are revoked. Such detail, however, is not necessary for merely condemning the milk. The dairyman who exercises all the precautions necessary to have milk leave his plant clean is going to be interested sufficiently to know that the milk is properly refrigerated en route and he is going to be unwilling for his product to be handled carelessly. The dirty dairyman will not care about these things except in the time of trouble, when he will attempt to place the blame elsewhere. Notwithstanding its limitations and any inexactness which characterize it, the fact remains that the bacteria count offers health authorities the most practical and effective method of detecting unfit contributors to the milk supply. Wherever standards based on the bacteria count have been established, a noticeable improvement in the milk supply has followed. By publishing the counts the public is aroused from its amazing indifference as to what kind of milk it drinks. Good dairies soon engage in wholesome rivalry. Even among the poorer dairies will be found a number stimulated to emulate the better methods of the higher graded ones. A community which upholds the hands of its health officer will shortly rid itself of the stubbornly dirty dairies.

With an improvement in the milk supply all classes are benefited, but the decrease in morbidity among infants is especially noticeable. The digestive organs of young children are their most vulnerable

ones, and diseases affecting the gastro-intestinal tract of children are the ones most markedly influenced by the improved milk supply.

DISCUSSION

Dr. S. H. Welch, Birmingham, Ala.—The getting of the bacterial count in diseases of children has been as well demonstrated as anything I know of. Dr. Snyder and I both started out in Birmingham and have practiced in Birmingham in a city which has markedly overgrown its every resource. We have had to deal with a milk situation which for a number of years has been one continuous grind, and frequently looked impossible. We have recently come from under an injunction of over a year's standing and are now beginning, we think, a new era of clean milk in Birmingham. We are having to deal with propositions that from a milk standpoint are overbalanced by the fact that we have so many other things on which we are centering that it has been difficult to get our people back of us in an effort to secure clean milk. I am of the opinion that it is possible, and is only possible, to obtain clean milk when the people of a community are taught sufficiently about the subject to demand clean milk. The most remarkable thing I have come in contact with in the practice of pediatrics is the ignorance of the mother as to the quality of the milk and in many instances even the name of the dairyman it comes from. It matters not whether these are the better class of people or the middle class. When you ask if standard milk is used, if they know—which is not always the case—they will reply that it is and their authority for its being good milk is that the dairyman has told them he has a high rating and is producing clean milk.

Another thing which has been brought out very prominently before us who have worked with milk has been our inability to get the general practitioner to know the milk regulations and to demand clean milk. At a recent discussion at the Medical Society I asked our health officer what percentage of the men he considered posted on milk. Our discussion showed that the general practitioner and the general surgeon bothered themselves so little about milk that the majority of them knew nothing about it. This is a regrettable fact, that many institutions interested in doing surgery and the practice of medicine have given very little concern as to the source of their milk supply. On several occasions, both in our own hospitals and in other institutions, I have been surprised in answer to the question, "Where do you get your milk?" to find that the man who was doing the greatest amount of work there did not know at all.

Birmingham's infant mortality has always been high. Some work had been done there whose conclusions were unsatisfactory. Birmingham's excess of infant mortality is due largely to its milk supply. I do not hesitate to make this statement because we are a growing town. We have rapidly outgrown every sanitary and health requirement and I do not hesitate to say so because I believe we are now in a position to face the difficulties and produce a better grade of milk, and when we do produce a better grade of milk Birmingham's death rate will show more clearly what is the relation between the high bacterial count in milk and the death rate in children.

I was much impressed, and a little bit embarrassed, by the fact that when I walked through the exhibit room just a few days ago—to my mind it is distinctly significant—the Dryco representative here came up and very enthusiastically greeted me, stating that I was one of his large Dryco users.

The relation of high bacterial count in diseases of children is an explanation of why so many of us have had to go to dry milk feeding. It has a low bacterial count and has demonstrated to us that it has a very markedly lower colitis line behind it and a smaller death rate, due to the fact that we in Birmingham are unable to produce a milk of a low bacterial count, a low bacterial count in a balanced milk.

Dr. L. B. McBrayer, Sanatorium, N. C.—I want to thank the Secretary of this Section for securing a paper on milk, and I want to thank him for securing Dr. Snyder to write it. Aside from the important scientific facts presented, it was an intellectual entertainment to listen to it. I want to say for the benefit largely of the secretaries of the state boards of health who are present that I think that the state boards of health come pretty near passing up the milk question altogether. I think it is one of the most important problems that confronts the American people. You have not had before this Section in the last several years a paper on the subject of milk.

I think, Dr. Snyder, that we are going to hear more about it in the future for the reason that we are now beginning to come down to the fundamentals of things and beginning to study the nutrition of the children. We will probably later study nutrition of the child when he gets older, and when we begin to do that it is absolutely necessary to take into consideration as the most important question the study of milk.

There has been untold evidences of the value of a low bacterial count in feeding children. I have in mind at this time where a mother took some clean milk—which we called at that time under the rules of the game "certified milk"—all around the United States with her in order that her baby might continue to receive clean milk. If that had had a high bacterial count when she started with it, it would have been sour, it would have had sufficient bacteria to sour it in about the first twenty-four or thirty-six hours out. It would also have had enough bacteria to make the baby sick in the same length of time.

It is too large a subject to discuss in five minutes and I simply say again in closing that I am delighted that it has been brought to the attention of this Section in such a forceful way, and I congratulate both Dr. Snyder and Dr. Welch upon the interest that they have taken in it. I desire to vouch for them that the death

rate in babies will be reduced in Birmingham if they keep up the work.

Dr. Oscar Dowling, New Orleans, La.—I was very glad to hear the paper of Dr. Snyder. For several years we have been making an effort in Louisiana to provide people with clean milk in the hope of having the bacterial count reduced. Unfortunately, we have been unable to get enough people interested to build the proper kind of dairies with proper equipment and reliable stock to carry on the work as it should be. We have succeeded, however, in having some real up-to-date dairies constructed. I was talking to one man, a Louisianian, the other dav who has invested $450,000 in one dairy in Texas. He has a milch cow for which he paid $10,000 and thirty for which he paid $2,800 each, and one male which cost $25,000.

Referring to the average market milk, ten years ago I made a trip around the country to see the kind of milk people were producing. I did this for the reason so many people said they wouldn't use local milk because it was not clean and they could get a clean product by buying it in the stores. I found the dirtiest milk I ever saw. They were bringing it into the plants; they were inducing the people to get their milk on the ground; and then they would purify it. That is where I got disgusted with pasteurization of milk. Think of the dead bacteria in the milk. There is again the production of bacteria, together with the dead bacteria, and you are feeding that to the children. Recently I took a sample of milk from one of our best dairies and found the bacterial count 2,400. In several samples it went as high as two million, four hundred thousand.

I don't know of anything more important than the production of clean milk. I hope the time will come soon when we will be safe in buying and giving to the babies and sick people milk as we find it. In Louisiana you can buy a thousand gallons of water at seven and a half cents. If that is put into the milk and sold at sixty cents a gallon there is a nice profit.

The City Health Officer of New Orleans has had on an active campaign recently to try to stop the watering of milk. A bill which died in committee was introduced in the Legislature to require the sale of milk as it comes from the cow, and providing that any one guilty of selling diluted milk would be sent to jail for the first offense and to the penitentiary for the second offense. We caught one man in the country adulterating milk — we found a shrimp in it. When the man came before us to explain why he should not be prosecuted, his answer was that he couldn't "keep his cows from drinking the bayou water."

We had another man prosecuted. We showed that he added 10 per cent of water. On the stand he admitted that possibly he had added 1 per cent. The judge promptly declared him not guilty because he said 1 per cent wouldn't hurt the milk. Until we can get better enforcement of the laws by the courts you can see what we are up against.

SURGERY

RAILWAY, INDUSTRIAL, GYNECOLOGICAL, OBSTETRICAL AND UROLOGICAL

THE IDEAL OBSTETRICIAN*

By George Clark Mosher,
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The organization of this group brings a promise of great progress in obstetrics in the Southland, even in view of the fact that there are already two national societies, besides the Section of the American Medical Association, interested in this subject.

However, the American Gynecological and the American Association of Obstetricians and Gynecologists are both composed of teachers; and the American Medical Association, reaching from coast to coast, covers so much territory that our men can but seldom attend its sessions on account of the distances. The personnel of this group consists of a few specialists and a much larger number of general practitioners, a part of whose work is obstetrics, who are doing the major portion of maternity care throughout the country.

Obstetrics has always been a sort of medical Cinderella. We need but look over the records of the last eighty years to realize this truth. The late John Burroughs, in a whole page article in the *New York Times* but a short period before his death, made a statement that the money spent on doctors and nurses at the birth of a child is wasted. He based his claim on the argument that the entire sum paid out for the confinement of his mother was a $3.00 fee to the medical man. All the additional care the poor woman received was that of the hired girl who brought her food and made her bed.

The great naturalist evidently failed to appreciate his inheritance of virile stock, and the care of a mother such as his must have been, which enabled him to survive the many dangers which beset birth and infancy. No one can estimate the loss of life to the Nation of those born simultaneously and not protected by his fortunate immunity. For in the day of the babyhood of Mr. Burroughs prenatal care was unknown, and the scourge of childbed fever was claiming its victims in thousands of cases where it was laid to the influence of "miasma," a germ floating in the air, which settled on the patient and carried her off to her final reward.

It is a sad commentary on the intelligence of the so-called cultured classes that, to so large a degree, they have been in times past heterodox, and suspicious of the achievements of physicians, especially in the line of obstetrics. A story is told of Dr. Willoughby, a famous English surgeon, whose daughter was a midwife, that he crept into the lying-in room of a noble lady on his hands and knees and, whipping the forceps out from his pocket, he hurriedly applied them, extracted the baby for her and made his escape, unknown to the great personage, who never realized that a man midwife had dared penetrate the privacy of her bedchamber.

A Bavarian physician, Dr. Wirth, donned the dress of a woman and in this disguise entered, in consultation, the room of a woman in labor, only to be discovered and burned at the stake as his reward.

As late as the end of the last century, 1890, no obstetrician was eligible in England to the Royal College of Surgeons. Our own Section is the last to be organized in the Southern Medical Association, although obstetrics is of such vital importance that it should stand first of the major triumvirate — obstetrics, internal medicine, and surgery. Our own child, pediatrics, has here a three days' program, while we try to cover obstetrics

*Chairman's Address, Section on Obstetrics, Southern Medical Association, Fifteenth Annual Meeting, Hot Springs, Ark., Nov. 14-17, 1921.

and gynecology in one day. But we are coming into our own in the Southern as well as in the general field of medical and surgical art.* We shall hail the day when the profession itself realizes that there is a speciality of obstetrics, and that a man has even less right to deliver a child from its mother's womb without training than he has to remove a fibroid or a cystic ovary without training.

That obstetrics has been so slow in gaining the dignity and importance which it should be accorded is less to be wondered at, since birth is a process of Nature. Children are born with or without artificial assistance, while surgery is wholly an evolution of science and art.

Indeed, the term midwifery bears a tradition of reproach, recognizing as it does the survival of the primitive practice which left the management of labor in the hands of ignorant, if well-intentioned, women.

That our states should fail to so value the lives of its possible future citizens as not to enact protective laws relative to maternal and infant welfare, and thus change present conditions throughout the entire country, seems preposterous. Since coming to this meeting, your Chairman has been told by the President of the Board of Health of one of the Gulf States that 60 per cent of the women in his State are attended by negro midwives, of whom he has listed the names of three thousand. The use of the midwife is generally universal among the foreign-born of our large cities, a custom brought with them from their native lands.

In 1916, in the United States 16,000 deaths of women in childbirth alone were reported. This number was increased to 23,000 in 1918. The two most destructive foes to our mothers are sepsis and eclampsia. The death rate from these causes has increased from 1901 to 1919 instead of diminishing, in spite of all the improvement in hospital technic, because the great majority of women are still delivered in their homes. No account is here taken of the thousands who are made permanent invalids through their service to humanity in the function of maternity. In a recent work on gynecology the statement is made that the great bulk of gynecological surgery is the result of poor obstetrics. How familiar to all of us is the story, "I have never known a well day since the birth of my first child." And yet much of this morbidity and mortality is preventable.

Snow's statistics demonstrate that the dangers to the child are even more perilous than those of the mother, showing that during the first four weeks of extrauterine life 250,000 infants perish. In an article on "Obstetric Death" our friend, Dr. Barton Cooke Hirst, in a recent number of the *Journal of the American Medical Association*, claims that 25 per cent of all life is lost before birth, a wastage almost incalculable. At such a sacrifice motherhood is indeed a hazardous occupation.

Can this Section be instrumental in helping to reduce the melancholy record which these statistics present?

Your Chairman believes that never was a greater opportunity offered for service than is before us today if we will but visualize the facts with which we are more or less familiar, and will demand certain definite qualifications for ourselves which will meet the necessity for better technic in labor, an evolution which will develop the ideal obstetrician.

First of all, the obstetrician must be a trained physician. Twenty-five years ago the teaching of obstetrics in our prominent medical schools was so bad that any one of them, as was stated in a recent symposium on medical education, would have been promptly closed by the government of any country in Europe under similar conditions.

And the obstetrician, as emphasized by Dr. Joseph B. deLee in an address before the American Gynecological Society, is the one man in medicine who must be universally qualified. He must have a ground work of training covering every department from biology, anatomy, embryology and physiology, on through the special surgery connected with the mechanism of labor and its management and the complications that may ensue in the delivery of the child.

*The Council voted at the Hot Springs meeting to make Obstetrics a full-time section.

Prenatal care, only a few years ago, was not even suggested in our obstetrical curriculum. Ordinarily the pregnant patient was not seen by her attendant until the onset of labor. Often, too, in the most intelligent families confinement was an emergency. The date of expected delivery was calculated from the quickening of the child, verified by the time of the last menstruation; no measurements were made nor any physical examinations, except occasionally an unfortunate meddlesome vaginal exploration, which frequently caused a serious infection.

The lack of proper training in our medical colleges is in evidence in the results obtained by many men doing obstetrics.

It can not be questioned that great advance has been made in the teaching of obstetrics, although Dr. Hirst believes we still average far below the medical schools of Europe, both in clinical material and in roster. Prenatal care, including accurate measurements of both mother and child, is now a part of the routine drill in most of our colleges.

We have among our teachers of obstetrics men of the most outstanding ability, and yet, even today, the boards in authority in many of our universities do not give to this subject the distinction which its importance deserves. The distinguished professor of obstetrics in one of the most prominent of the Eastern schools has for twenty years had his department of the medical college in the basement of the building because of politics in the faculty and in the board.

As a consequence of this unjust atmosphere the student himself belittles the value of the subject and begins his undergraduate career with a prejudiced view.

The ordinary medical student is always looking for the spectacular. He wants to see a laparotomy or a gastro-enterotomy, a gall-bladder operation or a nephrectomy, a major amputation of the breast, or the confirmation of a diagnosis in psychiatry through the trephining of the skull. The routine management of normal labor affords him no thrill.

But alas, the management of labor is usually the very first surgical demand to be met by the new graduate. None of the major surgery needs be considered by the medical neophite. He must be familiar with at least the essentials of good obstetrics before he attempts his first case of labor. Inadequate knowledge is gained by the aid of experience, but at the risk of the patient. The diagnosis of the occiput posterior or anterior; the breech or the vertex; the differentiation of single or multiple pregnancy; the height of the fundus; the relation of the presenting part to the brim of the pelvis; all these problems may be puzzling to the experienced operator on occasion, but to the beginner, without thorough drill under competent instructors, they mean nothing. Fortunately many times Nature comes to his relief if he can only be brave enough to restrain his impatience and maintain firmness with the family and friends who insist that something ought to be done. If he himself knows that the only safe and sane thing to do is to wait, his confidence inspires hopefulness and sets their minds at rest. Unfortunately, on the other hand, he may trust to Nature so long in another case that abnormal conditions arise which he is incompetent to recognize or cope with. Frequently the result is disaster.

That physician is the rare exception who, after entering his professional work, takes the time to study and familiarize himself with the details which could have been easily acquired in a good hospital clinic, and which afford the obstetric training he should be given before a diploma is granted. If in his student days he acquires a clear knowledge of the mechanism of normal labor, and studies the individual case in the light of his teaching, his technic is assured, every step is taken with caution but with deliberate confidence in his ability to secure the best possible result.

That larger opportunity may be open to the student for this training, there is a great need of more maternity clinics—even if not actually connected with medical colleges—where material may be assembled for his comprehensive instruction. Such clinics are being widely established in Great Britain.

When all theoretical and clinical training of the undergraduate has been completed he is fitted only with the founda-

tion for his superstructure in obstetrics. He must realize that no matter how well grounded has been his fundamental drill he must go at once into the broader field of post-graduate education.

Many men leave their college after graduating with honor and distinction and on entering practice settle down satisfied with their technical knowledge. They do not read the journals nor attend medical societies. They naturally fall woefully behind their competitors, who are studying their cases, keeping case records, and from these reading papers in the societies. These men fail to live up to their light. It is the part of the duty of this Section to bring them to a realization of the wonderful advantage of co-operation and the mutual help which the society brings to all of us.

The state and county and district societies are alike invaluable. Sections on special subjects, like our obstetric group, constitute the forum where we all meet on a common footing, and where our problems through discussion are solved.

THE IDEAL OBSTETRICIAN MUST BE CONSERVATIVE

As St. Paul told the Corinthians, "Believing all things, hoping all things, enduring all things," we must be willing to sit and wait a while when all goes along in normal mechanism, even though the rapid-fire, up-to-the-minute radical, who would disdain such waste of time, calls us midwives who are willing to give Nature a chance.

Professor Francis Marion Johnson, to whom your Chairman owes much in the way of obstetric principles, used to tell his classes not to be led into temptation to get hold of a foot in breech extraction, since all haste in delivery was but a delusion and might end in fatality.

The ideal obstetrician must set his face against all expedients to shorten labor unless scientifically indicated.

In the novel "Tristam Shandy," Laurence Sterne has the hero relate the story of the prowess of Dr. Slop in the use of the forceps, telling his auditors:

"My Uncle Toby, being but recently back from the fighting in Flanders, was present when Dr. Slop adjusted the machine, and the child was hurled into the world with mighty speed, like a ball shot from the mouth of a cannon."

The forceps is the most useful surgical instrument ever invented. But since the advent of the universal administration of anesthetics in labor, it has become all too easy to put the patient to sleep, and before engagement of the head to apply high forceps to do an extraction. Many instances of maternal lacerations and fetal cerebral lesions are directly traceable to hasty and indiscreet application of the forceps, even though a less degree of celerity is exercised than that which the picturesque language of my Uncle Toby ascribes to Dr. Slop. These subjects throughout life are an ever-present evidence against the medical man who thus violated the first law of the forceps.

Not only are forceps to be condemned when improperly used, but under this category should also be considered the indiscriminate use of pituitrin, version and Cæsarean section. The reservation is always made that these expedients may be employed by those qualified by special training, and who are experts in the special method suggested. Otherwise no physician should undertake any of these proceedings without consultation.

That Cæsarean section has come to be all too commonplace there can be no question. The story is told of a member of the faculty of a certain Western university who brought his wife to Kansas City to have a section done merely to spare her any of the pain of childbirth.

The ideal obstetrician does not call at the beginning of labor for his friend, the consulting surgeon, who may be standing by, knife in hand, that the baby, in the language of Macbeth, may be "From its mother's womb untimely ripped" before she has been given the test of labor.

The present Professor of Obstetrics at Harvard College, Dr. Franklin Newell, in a paper published in 1919, said that he had discovered by a survey of towns within a radius of forty miles of Boston that there were in a period of a few years in that region a series of one hundred Cæsarean sections done by amateur surgeons, in which the mortality was 100 per cent. It goes without saying that a 100 per cent mortality is an inexcusable

stigma on the profession. Such a record could only result in case of Cæsarean section done without indication and on a patient septic before operation. It may be taken for granted that vaginal examinations had been made and various attempted manipulations, including forceps and versions, before the section.

Cæsarean section has a definite place in obstetrics as has every other means of safeguarding the two patients. We must bear in mind Rudolph Holmes' warning that obstetrics is in danger of becoming a lost art and endeavor to give to a woman in her lying-in the test of labor before resorting to any surgical expedient. No Cæsarean should be done except after consultation, and in the case of an emergency where the life of the child or the mother, or both, is involved; or where some danger is indicated by marked discrepancy of the Baudelocque, the McDonald and other measurements of the mother and child. These measurements, which have become routine and accurate, will be presented for us this afternoon by an expert in their use, our friend, Dr. Chas. B. Reed, whose voice has been "As one crying in the wilderness" for this right of the unborn child.

These measurements, as well as the position of the child and of the fetal heart, will make clear the deviations from the normal which indicate the rare instances in which the section is suggested.

Many surgeons, having in mind the dangers of infection, have refused to perform Cæsarean section after more than one vaginal examination has been made in the labor.

Conditions in the case under consideration must determine the question of the mode of delivery.

The ideal obstetrician must be progressive without being radical. One of the greatest drawbacks to the progress of scientific medicine in general, and obstetrics in particular, is the tendency of those in the limelight in the profession to decry the reformer and the man with a vision, and to condemn all innovations as being selfish exploitation. The attack is often continued after time has demonstrated the fallacy of an ultraconservative attitude.

Recall the bitter fight made by Meigs and Hodge, and later by Fordyce Barker, on Oliver Wendell Holmes, then Professor of Anatomy in Harvard College, for his outspoken stand on the contagiousness of childbed fever, to which his essay, "Puerperal Fever, the Private Pestilence," gave such widespread publicity.

This essay was written in 1843. In an acknowledgment to the "Autocrat of the Breakfast Table" for the famous essay the author of this paper once expressed his obligation and appreciation. Dr. Holmes wrote in reply:

> "I shall rather forego all pretension to literary attainments than to have failed to write the essay on 'The Private Pestilence,' which I have good reason to believe has saved many valuable lives."

The same two men, Meigs and Hodge, in 1847 fought Sir James Y. Simpson in his advocacy of the use of ether anesthesia, which also had its prolonged opposition. They said, "Pain in labor is a God-given experience," "To interfere with labor pains is flying in the face of Providence," and more along the same line of familiar argument. This professional warfare is comparable to the denunciation today against scopolamin analgesia by those who have had no experience with it in a routine series of observations, but who enter a general denial, because they are not willing to give it a fair and honest trial. And yet some of us believe that scopolamin is the greatest boon in obstetrics since the advent of inhalation anesthesia and asepsis. While to bring into discussion controversial points is not in good taste, where there is no right of subsequent reply, we must say with Voltaire:

> "I give you my opinion, not as being the best, but as being mine."

The ideal obstetrician must respect the value of his own services.

No professional man, from tradition and from lack of time, is so proverbially unbusinesslike as the doctor and the obstetrician is the most conspicuous offender. He is not a tradesman, and he should be free from any spirit of commercialism. When a prospective patient consults him his first consideration is not the possible fee. He does not preface his

examination, as it is said is done by the commercial accoucheur, by saying:

"My minimum fee is $250.00. If you can not pay that sum, you are wasting your time and mine."

But once the question of the fee is presented, he should feel no hesitancy to place a just monetary value on the service he is to render. The most difficult point to decide is what is just to one's self and at the same time meets the financial circumstances of the family. But "shopping" on the part of prospective parents, who demand the best in every line, no matter what the cost, and are abundantly able to pay for it, should be discouraged.

The profession itself must be made to realize that as a rule obstetrical fees are pitifully inadequate and not at all commensurate with those in other branches of medicine. As a result we find many of our promising obstetricians drifting into gynecology because of the more attractive compensation and the lessened responsibility. Many a dentist receives more for the extraction of a tooth than is paid to the attendant in the delivery of a child.

Doubtless competition, with a desire to prevent the case from being secured by some other physician and thus perhaps all the family practice be lost, has influenced the general practitioner to adopt a scale of fees more nearly on an equality with the few dollars paid as wages to the midwife than to the honorarium which the surgeon receives.

The unfortunate propaganda of the Johns Hopkins professors, which has been exploited through the popular magazines, has done a great deal of harm, because it is grossly misleading and gives a wrong impression to the public. The people who can pay a thousand dollars, or any other large sum, in fees for surgical operations are not the average families who constitute our clientele; they are the rich who should not come under the same classification with our great body of self-respecting middle class people, so called, upon whom rests the burden of parentage, and who will never be asked a fee which on its face would be preposterous.

Children are born in the early years of married life, before the surgical age of gall-bladder, enlarged prostate and other major league engagements. However, when the subject comes up for discussion in the newspapers and magazines, there is no discrimination and every medical man is likely to be criticised if any fee is charged more than the three dollars which Mr. Burroughs had to pay when John was born. The fee of the obstetrician is from nothing up, but it must be commensurate with that received from other surgical cases in the community.

No special surgery is so ill-paid as obstetrics. In no other are two lives to be considered. In no other must the time limit be taken into account in figures of hours, even days, rather than of minutes. Education alone can change the attitude of the public in its estimate of the comparative worth of obstetrical and other surgical fees. But not until the obstetrician himself shows a proper respect for the proper value of his own services will that service receive the compensation which it deserves.

PERSONAL QUALIFICATIONS

Not only must the ideal obstetrician have the professional attainments which make him competent to assume the responsibility for safeguarding two lives in time of peril, but there are personal characteristics as well which are important to insure his success.

The ideal obstetrician must be a gentleman. He may not be polished with the culture that polite society stamps as gentle, but he must be imbued with the spirit of gentleness. He recognizes the vagaries and whims and even unreasonable demands of the woman in pregnancy. He appreciates that her condition is one of disturbed metabolism, and he is therefore patient and alert in her behalf. He realizes that child-bearing is to be regarded as a not purely physiological process, but that the prospective mother must have protection through the ordeal which she faces in bringing a new being into the world, and that the life of the unborn child is sacred. A dignified bearing with cordial sympathy will appeal to the instinctive demand of the young mother to assure her that he is not only her pro-

tector, but a real friend in her hour of need.

The ideal obstetrician must be an humanitarian. He is filled with an inborn desire for service. He considers his patient in the one aspect—a woman who is to be spared the perils which the coming mother faces in her confinement by the protection which may be summed up in the phrase, intelligent, conscientious attention and rigid asepsis. He resolves that in carrying her through her pregnancy he will, clearing the rocks of Scylla and Charybdis, land her on the happy shores of motherhood, a healthy baby in her arms, spared to assume the responsibility of her new-found happiness.

The instinct for service must not be limited by the ideal obstetrician to his private patients alone, but it is his part as well to help arouse the conscience of the world to the awful significance of the morbidity and mortality of childbirth. It is the professional duty of every obstetrician to help secure for the poor in every community opportunity for prenatal care as well as for those financially able to command that attention. No prospective mother should go to labor without this informative attention. In the 354 cases, from the various prenatal clinics, confined in Kansas City last year, there was no maternal mortality, and the infant mortality was 50 per cent of the general infant death rate in Kansas City.

Nothing more practical nor more vital could be undertaken by our new Section than to initiate a movement to so arouse the public to the claims of motherhood, that there shall be established in every county in the Southland a hospital to serve as a prenatal center and a maternity home, so that it shall be possible for women in the country districts to have the same facilities for care that are available in the cities.

Not only the death of the unborn should claim the concern of the ideal obstetrician, but also the lack of child-bearing and sterility in the families best fitted by blood and inheritance, and by financial ability, to care for children, should demand his notice.

Some one has said that child-bearing is the world's greatest industry, but how many quit with the first product! Forty years ago the average family in New England was six and a fraction children; today it is barely two. One child sterility is a calamity of such proportions that in France, before the war, the rate of birth so fell that the death rate was in excess, and the Government paid a bonus to families of over three children. Unless the conditions indicated by these figures could be changed, the result would be the downfall of the Nation.

We commend the adoption of children into families where actual sterility exists, but one of the striking developments of our modern social life is the growing fashion of healthy and prosperous young married couples to thus gratify their instinctive craving for children rather than to extend their own life by progeny which they know to be of clean blood and good breeding; to accept, in place of their own possible offspring, those from foundling societies and maternity hospitals, with an unknown inheritance, perhaps of crime and disease.

With all appreciation of the philanthropy which the adoption of children involves, and with due regard for the helpless infant thrown on the charity of the world, who may thus receive the blessing of a name and a home, a grave question presents itself as to the character of coming generations if those physically and mentally well endowed, stifling their conscience and sacrificing their birthright, renounce the burden of child-bearing and relegate parentage to the uncertain and irresponsible members of society.

The essentials of the ideal obstetrician which have been suggested answer, in part, it is hoped, the reason for the existence of this Section. These essentials, as a whole, may be embodied in the inspiration of the idealist, expressed in one word, and that word is service, service in the salvage of human life.

Nature made provision for the continuation of human life in that wonderful evolution, the development of the embryo into the perfect child. That this provision of Nature may be protected is the service of the ideal obstetrician. This service is rendered by education; educa-

tion of the probationer and of the profession; education of the patient and of the public; education of the patrician and of the proletariat. This education begins with ourselves.

In the words of John Milton,

"Accuse not Nature. She hath done her part. Do thou but thine."

A MODIFICATION OF YOUNG'S PERINEAL PROSTATECTOMY*

By A. J. Crowell, M.D., F.A.C.S., Charlotte, N. C.

At our Louisville meeting I promised to study the advantages and disadvantages of both the perineal and the suprapubic prostatectomy, alternating the two operations in our Clinic, and to report our results. This was undertaken, but we became discouraged and abandoned the study. The only death we have had since that time in our prostatic work was one following the first step in the two-stage suprapubic operation. This was done under local anesthesia. The patient took pneumonia thirty-six hours thereafter and died on the fourth day. This was an ideal case for this operation. There were two large stones in his bladder. Clinically he was in fine shape and all the laboratory tests showed him to be in good condition. He had been prepared for operaton by intermittent catheterization for two weeks.

The pneumonia may have been a coincidence, but it suggested an inquiry into the percentage of deaths following the first step in the two-stage suprapubic operation. In making up statistics this death could not be charged against prostatectomy. The gland had not been removed. Only one other suprapubic prostatectomy has been done in our Clinic since then and the first step in this case had been done elsewhere.

We have no data as to the percentage of fatalities following the first step in the two-stage suprapubic operation, but in conversation with Dr. Buerger, of New York, he estimated that he lost as many patients following the first as the second stage in this operation. This, coming from such an authority, in addition to our own experience, is responsible for the abandonment of our study and accounts for our efforts to improve upon the perineal operation advocated by Dr. Young. Dr. Hinman's elaborate report at the Montreal meeting of the American Urological Association last June on the results he obtained in a series of the two operations settled this question in so far as we are concerned. We believe his results justify us in our decision.

The advent of sacral anesthesia or a more thorough knowledge of its use gives the perineal operation a decided advantage over the suprapubic because the latter operation requires an additional infiltration of the abdominal muscles. This is objectionable from two standpoints: first, because of the danger attending the increased amount of the drug necessary; and, second, the danger of sloughing which occasionally follows the infiltration method. An objection urged against the perineal operation is the greater length of time that it is necessary to keep the patient under a general anesthetic. Sacral nerve blocking obliterates this objection and it is attended with practically no danger.

If you will recall your anatomy you will find that the internal pudic nerve gives off filaments to the skin of the perineum, posterior half of the scrotum, and to the penis. The anterior half of the scrotum is supplied by the genito-crural and ilio-inguinal nerves. The second, third and fourth sacral pairs of nerves constitute the hypogastric plexus which supplies the bladder, rectum, prostate, and pelvic peritoneum. These nerves are easily reached and blocked off through the triangular space formed by the sacral cornua at the sacrococcygeal articulation. The solution we use for this purpose is the one used at the Mayo Clinic and is as follows: novocain 0.6 gm., sodium chloride 0.1 gm., sodium bicarbonate 0.15 gm. in 30 c. c. of sterile distilled water. The needle is inserted straight in midway between the cornua until it is felt to pass through the ligamentous structure. It is then directed parallel with the sacral canal for three or four millimeters and 30 c. c. of this solution is

*Chairman's Address, Section on Urology, Southern Medical Association, Fifteenth Annual Meeting, Hot Springs, Ark., Nov. 14-17, 1921.

slowly injected. An ordinary spinal puncture needle is used for this purpose. If the solution does not go in easily, the needle is not accurately placed and its location should be changed. Twenty minutes should elapse after its injection before operation is begun. At this time anesthesia is complete if the solution has been injected directly into the sacral canal.

This anesthesia has been very satisfactory in our hands. In three cases we failed to get the solution accurately in the canal and it was necessary to use a little gas in addition toward the end of the operation. The patients, as a rule, complain of no pain and there has been in our experience no shock following prostatectomy under its influence in the fifteen consecutive cases operated on.

In discussing this subject at the Boston meeting of the American Medical Association last June, the suprapubic advocates readily admitted that better results could be obtained by the perineal operation in cases of carcinoma of the prostate and in those with a small fibrous gland. We know this is true. Therefore the perineal operation has a decided advantage over the suprapubic since 30 to 35 per cent of the operative cases are of these types. The large adenomatous gland is more easily removed by the perineal route than either of the other types.

Fig. 1

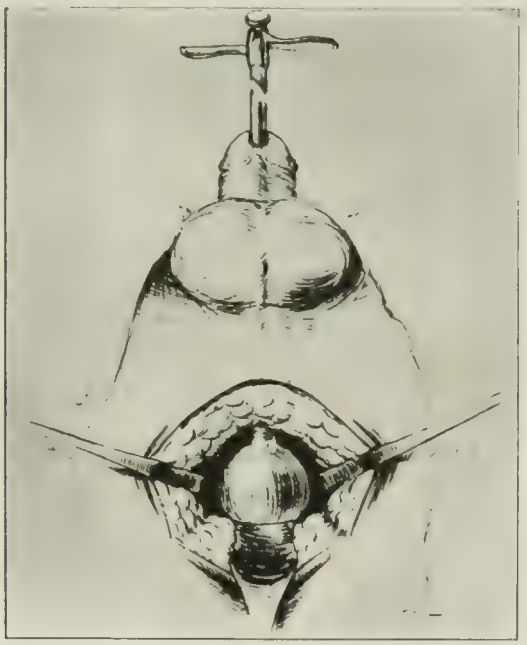

Fig. 2.

In looking up the literature on the subject I was surprised to find that only one person, Dr. Parker Sims,[1] reported having done the perineal operation under sacral anesthesia, but that many suprapubic operations had been performed under the combined use of sacral anesthesia and infiltration of the abdominal muscles.

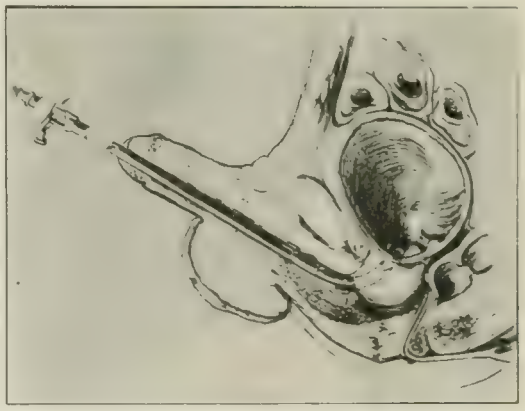

Fig. 3.

1. Intern. J. Surg., 34:191, June, 1921.

For more than a year we have been removing the large intravesicle gland, where all three lobes are enlarged, practically as it is done in the suprapubic operation.

Fig. 4.

The entire prostatic mucosa back of the verumontanum is removed with the gland, then the intravesicle capsule, covered with its bladder mucosa, is sutured to the cap-

Fig. 5.

sule at the junction of the membranous and prostatic urethra. This takes care of the capsule which otherwise protrudes into the bladder and may interfere with urination. The large area of raw surface created by the removal of the gland, is then closed and covered with mucous mem-

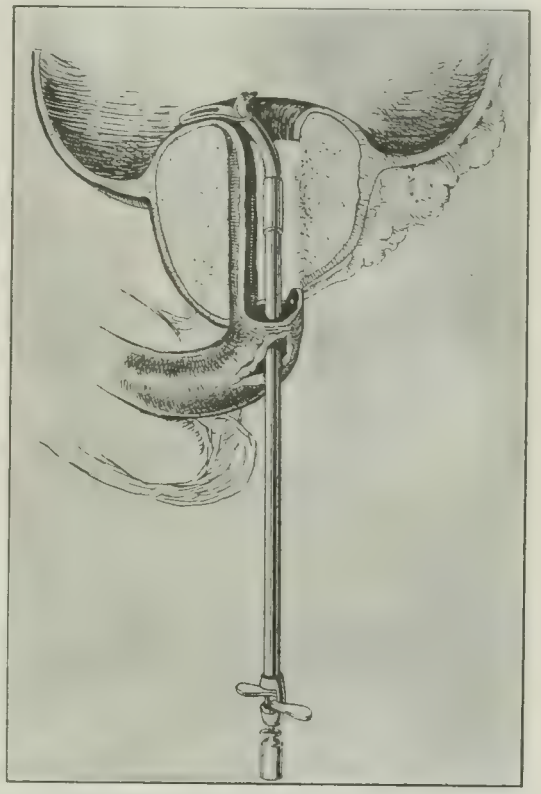

Fig. 6.

brane. Dead space is obliterated, sepsis rendered less liable, hemorrhage prevented and healing hastened by packing cigarette drains between the bladder drainage tube and capsule. The cigarette drainage has the advantage of being easily removed as well as preventing adhesions of the gauze to the tissue.

A sufficient number of cases have not been operated upon to justify us in giving an estimate as to the time saved in the closure of the wound, but we are encouraged to hope it will be from five to seven days. So far epididymitis, one of the most common complications, has not occurred in any of these cases. Of course, every case is a law unto itself and should be so studied and treated. The median lobe enlargement, especially if pedunculated, should be removed with its capsule or mucous mem-

brane by grasping and delivering it through the urethral opening by means of gland forceps. This can be done without

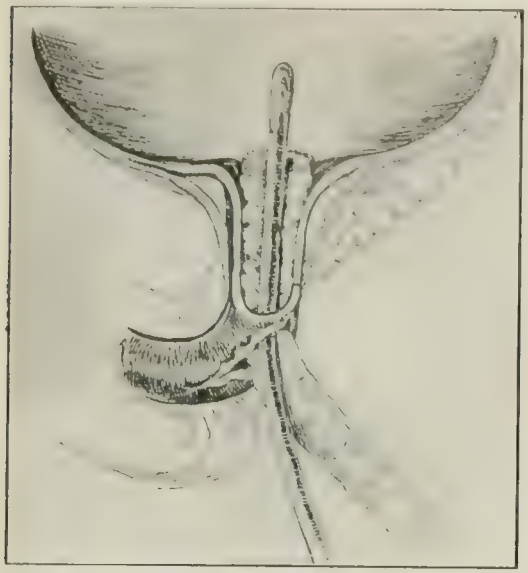

Fig. 7.

disturbing the prostatic mucous membrane. Such cases are fairly frequent.

The technic of the operation varies but little from that of Young's until the gland is exposed. The urethral guide we use is a modified Young's seminal vesiculectomy tractor which we designed a few years

Fig. 8

ago (Figure 1). It has the curve of an ordinary sound and by means of a cable in the curve, the blades can be opened after it is inserted into the bladder. The prostate is pulled up so that the danger of getting into the rectum is greatly minimized. The triangular ligament is then held up by lateral retractors (Fig. 2) and

Fig. 9.

the rectum is peeled off the gland and held with a broad posterior retractor (Fig. 3). The membranous urethra is opened and a

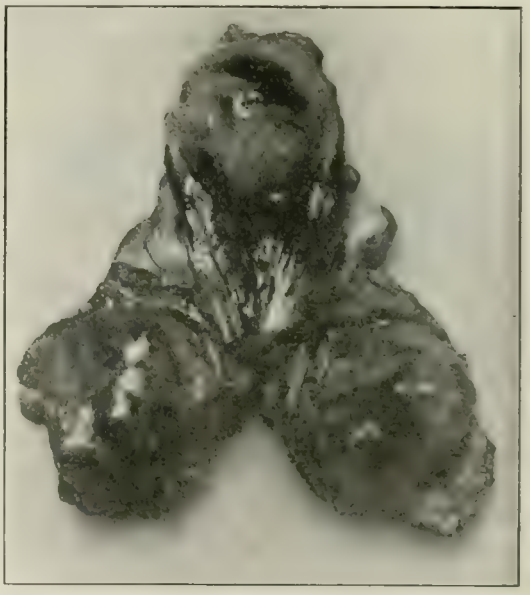

Fig. 10.

sound inserted into the bladder after the tractor is removed. The index finger of the left hand is then inserted into the blad-

der to verify the cystoscopic findings. If all three lobes are enlarged, an incision is made above and laterally through the prostatic mucous membrane and capsule of the gland on each side, as in cut (Fig. 4) uniting it with an inverted V-shaped incision through the mucous mem-

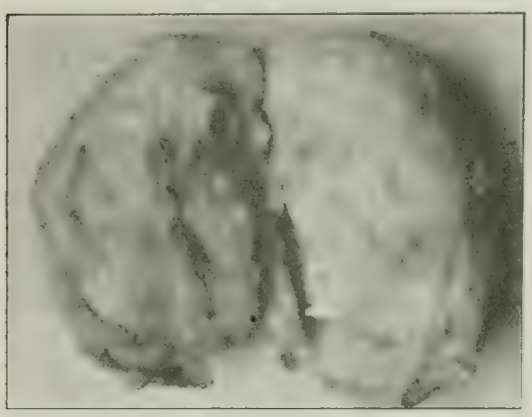

Fig. 11

brane of the floor of the urethra in order to avoid injuring the verumontanum and its mucous membrane. The entire gland is then peeled out of its capsule with its prostatic mucous membrane by means of a blunt peeler and the finger just as it is done in the suprapubic operation. The capsule above is then sutured to that be-

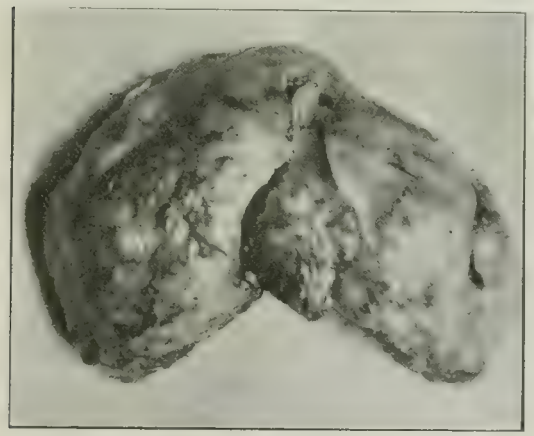

Fig. 12.

low as previously described (Fig. 5).

If we have to deal only with lateral lobe enlargement, the incisions are made through the mucous membrane and capsule on each side, above and below (Fig. 6), when the gland extends into the bladder and the lobes are removed separately with their mucous coverings. The capsule is closed laterally and packed as indicated in the drawing (Fig. 7). This restores the mucous membrane to the entire urethral canal. The operation requires considerably more time than is necessary in Young's operation but when done under local anesthesia, the problem of time is a negligible consideration as long as the patient is comfortable. Sacral anaesthesia lasts from three to eight hours and adds much to the patient's comfort after operation.

Figs. 8, 9, 10, 11 and 12 are reproduced photographs of some of the adenomatous glands removed by the method described in the text. The weights in grams will give some idea of the original size.

Fig. 8, weight 43 grams.
Fig. 9, weight 74 grams.
Fig. 10, weight 78 grams.
Fig. 11, weight 63 grams.
Fig. 12, weight 115 grams.

I am indebted to my associate, Dr. L. C. Todd, for valuable help in illustrating the various steps in the operation.

DIFFERENTIAL DIAGNOSIS BETWEEN KIDNEY AND INTRA-ABDOMINAL LESIONS*

By John R. Caulk, M.D.,
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In attempting to express to you my keen consciousness and sincere appreciation of the honor which you have conferred on Southern urology, in electing one of its members as your Chairman for the year, it is my earnest desire to discuss with you a subject which will appeal to surgeon and specialist alike.

A consideration of the diagnostic problems existing between diseases of the kidney and ureter and those within the peri-

*Chairman's Address, Section on Surgery, Southern Medical Association, Fifteenth Annual Meeting, Hot Springs, Ark., Nov. 14-17, 1921.

toneal cavity impressed me as most appropriate, since it was quite evident in the discussion of some phases of this subject upon the floor of this meeting a year ago that confusion still existed in the minds of some. It will, therefore, be my purpose in this paper to attempt to clarify some of the diagnostic difficulties, and if my remarks to protect the abdominal organs against misdirected surgery stimulate a more careful study of urinary disease, I shall feel that urology does not exist in vain.

I realize as well as you the occasional difficulties in properly interpreting both the acute and chronic abdomen, as they often tax the skill and judgment of the shrewdest diagnostician. It seems safe to assert, however, that the majority of such lesions, under proper study, lend themselves to gratifying accuracy in diagnosis. The mistaken diagnoses, particularly between intra- and extra-peritoneal lesions, are usually those of insufficient investigation. It would be absurd to suggest to you, who are so well informed, the diagnostic points between the various abdominal diseases. It is my desire, however, to refresh your memory with certain phases of urological diagnosis which may assist you in your daily problems of delineating the kidney and ureter, particularly from the appendix and gall-bladder, since these organs are the usual ones in the "round up."

You may, therefore, expect me to tread very lightly upon the smooth pavement lining of your peritoneal pathway, and to confine my meanderings chiefly to the stony gutters in the rear.

Let us, then, consider some of the practical points of this problem. It is perfectly safe to declare that there is seldom difficulty in saying positively that a disease is, or is not located in a kidney or ureter. This is a great comfort and enables at last this part of the entanglement to be straightened and should preclude the possibility of abdominal exploration for urinary disease. Taking this as a working basis, let us build around it the factors which make this statement, which sounds so bold, prove to be a stern reality. There are certain general features of great value in routine study which offer themselves. In the first place, the fever in an acute kidney lesion is much higher than in intra-abdominal lesions — 104 to 106° is common. Chills are more frequent at the advent of the fever. With such an elevation of temperature the pulse runs much lower, as a rule, than in intra-abdominal lesions.

The leukocyte count, which of course is very fluctuant in intra-abdominal conditions, is quite stable in acute kidney disease and is seldom over 15,000 to 18,000, even in the presence of such high fever, unless there be perinephritis, in which event it runs extremely high. Nausea and vomiting are far less common in acute kidneys with fever and pain than in intra-abdominal conditions. I believe you will bear me out that nausea and vomiting almost invariably occur in acute intra-peritoneal disease, whereas in the acute kidney lesions, they are far less apt to be present, particularly in the beginning. Abdominal examination is frequently elusive.

By far the most important clinical feature is the location of muscle spasm. This phenomena is almost invariably present over the seat of the inflammatory reaction and when present is a most valuable guide, certainly more substantial than pain or tenderness which are frequently deceptive. The localizing of a palpable tender mass is not always significant of the exact lesion, as the proximity of certain organs makes this at times untrustworthy. Indeed, the symptom-complex and physical findings may be so interlaced as to confuse the most careful student. With thorough study, however, the problem can usually be solved.

In the past week an elderly lady was referred to my service, having been acutely sick for several weeks with pain and tenderness in the upper quadrant. There had been considerable fever, lately slight jaundice. There was a large tender mass in the right hypochondrium most pronounced over the gall-bladder region. X-ray plates revealed a shadow well outside and below the usual kidney area. Tentative diagnosis on admission was acute gall-bladder disease. Urinalysis showed pus, blood and colon bacilli. Ureter catheter obtained 12 ounces of purulent urine from the right kidney and the mass and tenderness subsided.

A most important diagnostic aid in such acute lesions is to be secured by

urinalysis. This alone will often serve to solve the problem of differentiation. It was just the other day in our Clinic that Dr. Dock, Professor of Medicine, stated that throughout his teaching career he had always found difficulty in getting his students to make routine urinalyses. It is indeed gratifying to see that the profession is paying more attention to urinary studies. You may be surprised to know that in 1916, in making an analytical study of about 200 cases of renal infections, it was found, that the patients with pyelitis, pyelonephritis and pyeonephrosis had appeared with a positive diagnosis in only 9 per cent and practically 100 per cent gave definite evidence of urinary disease. The chief cause of error in diagnosis had been that a urinalysis had not been made.

It will be easy for you to realize the importance of making thorough routine urinalyses when we compare these statistics with our recent surgical ones, which were reported before the American Medical Association this year. In this series there were 263 major operations upon the kidney. Aside from the severe infections there were 220 cases with but one death, or 0.4 per cent mortality. There were 43 operations done upon acute infections with four deaths, or 9 per cent mortality, bringing the gross mortality to 1.6 per cent. In the latter group, with such high mortality, there was very little surgery done; usually drainage operations for the relief of large pyonephrosis and perinephritic abscesses. The patients were extremely ill and many of them had not had urinalyses made; for this reason, their condition had been overlooked. Faced with such a high mortality in the late kidney infections, I appeal to you to make more careful urinary studies in order that these serious conditions in the kidney may be prevented and if so the mortality in kidney surgery should be extremely low.

There are rare instances when an acutely inflamed appendix or a tubo-ovarian inflammation may give a pyaria, but in light of our present knowledge one should not be warranted in the exploration of the abdomen for one or the other of these conditions until the source of pus in the urine has been definitely determined. In this way a great many of the exploratory abdominal operations, done for hidden kidney infections, will be obviated and should there be the combination of the two, the clearing up of the kidney infection by ureter catheter drainage and lavage will serve to make the patient a much better surgical subject for the abdominal operation. Illustrating the value of urinalysis with detection of pus in the urine in acute lesions, the following case will serve as an excellent example.

A young girl entered the hospital with a temperature of 103° with a tender mass in the lower right quadrant, most pronounced over McBurney's point. All the tenderness and pain were centered at this location. The leukocytes were 15,000. She was sent to the hospital for an appendix abscess. On making the routine examination, her urine was found to be full of pus. The ureter catheter passed up into the right ureter and evacuated a large amount of purulent urine from the kidney. The patient immediately improved. In a couple of days an x-ray was taken with the ureter catheter in place, and the mass proved to be a large infected hydronephrosis in an ectopic kidney.

There still exists an idea that a few leukocytes in the urine are normal and a distinction seems to be made between leukocytes and pus cells. As far as modern urological ideas are concerned, both of these conceptions are entirely erroneous. A leukocyte is a pus cell, wherever it is found, and while a few leukocytes in the urine may not signify serious trouble, since they may have their origin from the deep urethra or genitals, yet the inattention to their presence may frequently cause the masking of a silent kidney, involved with either tuberculosis, stone or chronic pyelonephritis.

The presence of red blood cells in the urine should always make one suspicious of urinary tract lesions, as they seldom occur in anything else that would cause confusion with intra-abdominal disease. They are usually representative of urinary calculus, tuberculosis, tumor, etc., and only through accurate investigation can the exact nature be determined.

To illustrate the importance of this, let me cite briefly the story of a patient who had hematuria, chills and fever, and a large mass in the left upper quadrant. She came in with a diagnosis of an enlarged spleen with malarial hematuria. Another diagnosis was kidney tumor. On studying the case, I found she had a large blad-

der papilloma blocking the left ureteral orifice with an infected hydronephrosis back of it. After burning the papilloma with high frequency, the large renal tumor entirely disappeared.

Abdominal pain is often very perplexing, owing to reflections and radiations. The classical pain of gall-bladder, appendix and kidney are familiar to us all, but they do not always observe the hard and fast lines which have been assigned to them. For this reason, one is not justified in exploring an appendix or gall-bladder for a vague, indefinite pain, or, I may say, what seems to be a typical pain of a certain lesion until all of the causes which could produce this pain, have been looked into. I believe it should be a universal rule that all patients having abdominal pain should be radiographed and most of them cystoscoped. While this latter suggestion may seem rather radical to many of you, I am convinced that it will be of supreme assistance in many instances. The old idea that cystoscopic examination and ureter catheterization is a major undertaking has long since passed. The placing of ureter catheters into the ureters, in nine out of ten instances, will not take over a minute to a minute and a half, and is seldom attended by any trouble, except an occasional ureteral colic, and this can be almost invariably anticipated by the type of the individual and forestalled by a hypodermic of morphine and atropin. While a negative x-ray by no means serves to differentiate a kidney lesion from the intra-abdominal ones, it is frequently the medium of locating a renal or ureteral calculus, and also in a certain percentage of cases of detecting gall-stones. A negative x-ray and a negative urinalysis in the presence of abdominal pain, which may be located in the right lower quadrant simulating appendicial disease, or in the upper quadrant simulating gall-bladder trouble, or even duodenalor stomach disease, are not proof positive that the kidney is not responsible for the pain.

There is a very puzzling group of cases, namely, the slight renal movabilities, causing twists or kinks in the ureter with intermittent hydronephrosis, the so-called Dietl's crises, which will frequently defy all methods of diagnosis, except the special urological ones.

In our group of 263 surgical kidneys, there were 30 such cases on which we did renal fixation. Of this group 20 per cent had had previous appendectomy and 10 per cent more had had other abdominal operations without relief of pain. This is a very important group of cases, and one which I trust you will consider in the differentiation of obscure abdominal pains. It is only by means of the ureter catheter, x-ray, pyelography, taking of pyelograms with patients lying down and sitting up, the reproduction of the patient's pain by filling the kidney, that the diagnosis can be positively ascertained. The x-ray may lead to confusion in showing shadows which seem to be intra-urinary and naturally supposed to be the cause of the trouble, when they are due to some extraneous shadows, either glands, phleboliths, bowel concretions or atypical gall-stones and the like. This is particularly true in shadows seen along the region of the ureter and unnecessary ureteral explorations have been done for these marauders. It is for this reason that an operation for stone in the ureter, which is usually simple, has been designed as one of extreme difficulty. The chief trouble has always been that the stone was absent. Here again accurate urological investigation must be done and surgical exploration for x-ray shadows should be most strenuously condemned, since an appendix may be causing the pain. The x-ray, however, has been one of the most wonderful adjuncts to this phase of surgery, and since its frequent use in the study of vague abdominal pains the percentage of mistaken diagnoses between renal and ureteral calculi and intraperitoneal lesions has been remarkably lessened.

In 1916, in our series of renal and ureteral calculi, 27 per cent had had appendectomy for the pain, without relief. Our recent study of last year has shown a decided decline in this type of mistake. In this period of five years it has been cut down to 10 per cent. Let us not lose sight of the fact that there frequently occurs the association of renal with intra-abdominal lesions. The presence of gall-

stones and renal infections is quite common. It is extremely wise to clear the renal infection before gall-bladder surgery is done. There is occasionally some difficulty in differentiating gall-stones from kidney-stones. As a rule this is easy and one could hardly believe that where great care is given to the study of the conditions difficulties should arise. A recent experience has taught me that this combination may sometimes give trouble of differentiation.

A lady came in with hematuria, bringing an x-ray picture, showing a shadow, which was very dense and appeared to resemble a renal calculus, being located exactly within the kidney shadow. Naturally one would assume it was a renal stone producing a hemorrhage. Should one have operated, on the presence of the x-ray shadow and the existence of a hematuria, an unnecessary operation would have been performed on the kidney and the gall-bladder overlooked. The cystoscope showed the bleeding to be coming from the left kidney and the right pyelogram showed a line of separation between the middle calyx and the shadow. Furthermore, the shadow changed its position in several plates and was later shown to be a gall-stone.

Abdominal tumors are by palpation, frequently difficult of localization. Attention to the history of the disease and to modern diagnostic methods will usually certify as to the location of the growth. One can with assurance establish whether or not it is of renal origin in practically 100 per cent of the cases by the ureter catheter and pyelography. One should never lose sight of the fact that large abdominal tumors may have their origin in the scrotum from a testicle tumor which may be so insignificant as to escape notice. The rapid metastases of these tumors and the painless nature of the parent growth are responsible. It is, therefore, important in questionable masses to make a careful scrotal examination.

Another clinical symptom which has impressed me as leading to many erroneous diagnoses and often to faulty surgery has been bladder irritability.

As was mentioned previously in this paper, it is not foreign to have pelvic disease or appendicitis, productive of bladder symptoms, and while probably urologists may be incriminated for treating bladders which are secondary to such diseases, I feel confident that the other way about is by far more frequent. The solution of the problem again depends upon the complete investigation of the urinary tract for bladder distress.

Physicians are so prone to disregard bladder symptoms, or at best to give medicine without investigation. This is not made in a sense of criticism, but it is certainly stating facts. If the profession would only take a serious attitude about a disturbed bladder, particularly the slight discomforts, many renal diseases would be brought to cure in their early stages without the destructive effects which are so prone to occur, and the exact disease of the bladder itself could be dealt with in a scientific manner. One could cite innumerable instances where there have been pelvic and abdominal operations in the belief that the bladder troubles were reflex.

I know of one girl who had ten such operations, designed to cure her bladder irritability, without ever having had a cystoscopic study of the urinary tract. Her trouble was found to be a large infected hydro-ureter due to intra-mural stricture.

So frequently these bladder irritabilities may represent nerve diseases and be associated with pains in the abdominal region. You are all familiar with the diagnostic phases of occult central nervous disease productive of bladder symptoms by means of the cystoscope. The reflected pains from the prostate and vesicles associated with bladder irritability frequently enter the field of diagnostic complexity.

The elusive ulcer of the bladder described by Dr. Guy Hunner, which is commonly located on one of the lateral walls of the bladder, very frequently involving the peritoneum with adhesions associated with pains so frequently over the appendix region, must also be considered. The urine from such a bladder may be perfectly clear in its gross appearance and even free from cellular characteristics, yet productive of intense bladder irritability. Because of the negative urinary findings, these patients have been so frequently subjected to abdominal explorations in search for the cause of the condition.

To bring this to a close, I believe I can truthfully say that if one makes a thorough study of urinary disease he is sel-

dom at a loss for a diagnosis. Therefore, I can not urge you too strongly, both in acute and chronic conditions, whether they seem typical of certain disease or not, to make careful urinary examinations and whenever there is the slightest amount of foreign material, such as blood or pus, or if the patient is complaining of bladder symptoms, to have a complete investigation of the urinary tract, namely, cystoscopic examination with ureter catheterization, functional kidney tests, x-ray, possibly pyelogram and tests for the nitrogenous contents in the blood. If this be done, we may rest assured that there will be far less exploratory abdominal operations for pathology located outside the peritoneal cavity.

University Club Building.

A SIMPLE PROCEDURE FOR THE RADICAL CURE OF LARGE VESICAL DIVERTICULA*†

By J. T. Geraghty, M.D.,
Baltimore, Md.

The excision of large vesical diverticula, particularly when situated posteriorly, has been regarded by most surgeons as extremely difficult or impossible. Large diverticula lying posteriorly are always adherent to the rectum and surrounding structures and their complete removal by any of the various surgical technics proposed can not be accomplished without certain injury to these structures. When large diverticula occur in the neighborhood of a ureteral orifice, a not uncommon position for them, the ureter is always adherent to the sac wall. The separation of the ureter from the diverticulum requires extensive and tedious dissection and often can not be accomplished without injury to the ureter. Cabot and Chute both boldly advocate the division of the ureter and subsequent implantation into the bladder wall to render possible the removal of the sac. It is evident that the necessity of such a procedure increases markedly the risk of an already long and tedious dissection.

In a certain number of cases the orifice of the ureter lies within the diverticulum. Young has described a method whereby the normal entrance of the ureter into the bladder is left undisturbed. This, however, presupposes the possibility of freeing the extravesical portion of the ureter from the diverticular wall.

Lower has described a method in which, after opening the bladder, the cavity of

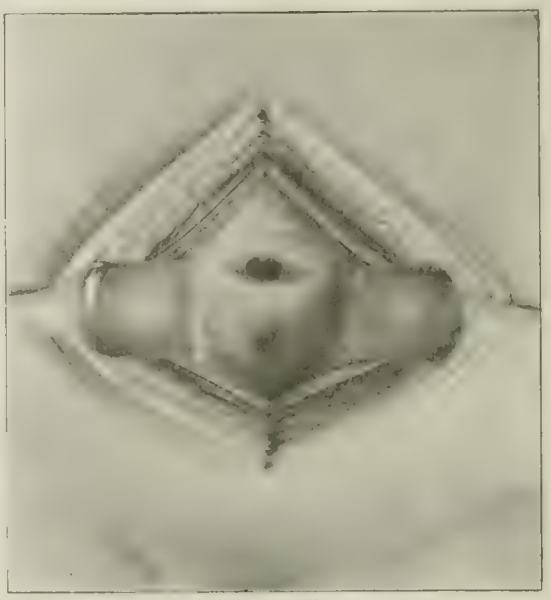

Fig. 1. Bladder has been opened and orifice of diverticulum lying just back of trigone is shown.

the diverticulum is packed tightly with gauze. The diverticulum is then freed extravesically. The extravesical method of removing the diverticulum is the one employed by most surgeons.

Young advocates the employment of suction to invaginate the sac into the bladder in order to facilitate its removal. This method is not applicable to cases in which the diverticulum is adherent to the surrounding structure, a condition which obtains always when large diverticula involve the posterior bladder wall.

Squier has proposed a method for the handling of large diverticula which open on the posterior bladder wall. This method

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*From the Brady Urological Institute of the Johns Hopkins Hospital, Baltimore, Md.

†Read in Section on Urology, Southern Medical Association, Fifteenth Annual Meeting, Hot Springs, Ark., Nov. 14-17, 1921.

consists of excising the roof of the diverticulum and the overlying bladder wall. He reports a successful result in which this method was employed where the sac could not be excised.

A study of the wall of the diverticular sac shows it to be composed essentially of two layers: an inner mucosa and an outer fibrous layer. Between the two there are found occasionally strands of muscle which are rarely present in the larger diverticula. The ease with which the mucosa could be separated from the outer layer suggested a simple procedure for their radical cure.

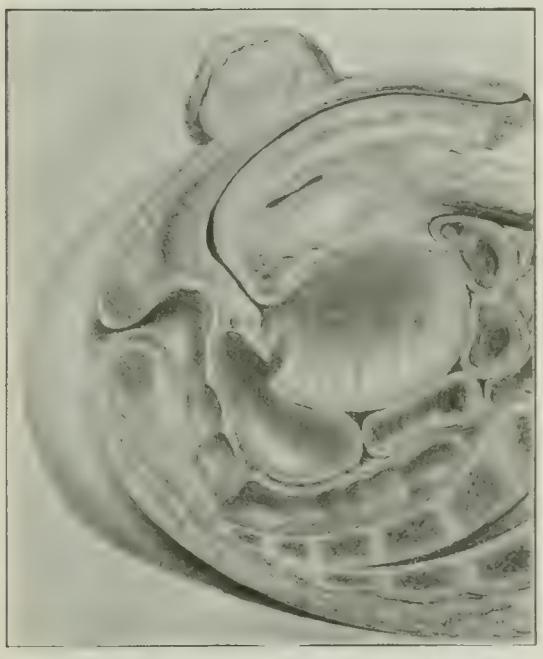

Fig. 2.—Cross section of view shown in Figure 1.

It is a well known fact that the removal or destruction of the lining membrane of a cyst or diverticulum is followed by the obliteration of the sac. The application of this principle suggested itself for the handling of large vesical diverticula whose position was such as to make their removal impossible or extremely difficult. The bladder is opened suprapubically in the usual manner and a good exposure of the region of the diverticular orifice obtained. An incision is now made through the muscular ring of the orifice, widening it and thus facilitating subsequent manipulations in the interior of the sac. The line of cleavage between the inner mucosa and the outer fibrous layer is secured very easily after the division of the ring and the separation of the two layers is then begun. A circular incision is now made through the mucous membrane of the orifice and the lining of the diverticulum removed by a process of blunt dissection and stripping with a gauze sponge. The removal of the lining membrane is accomplished with surprising ease and with very slight bleeding. The incision in the diverticular orifice is now closed about a rubber tube, or in cases where it is feasible the interior of the fibrous walled sac is drained extravesically and the opening of the orifice in the bladder closed entirely. In two cases the former method of drainage was employed and in one the latter. The postoperative course and ultimate result in each was equally good. Three cases of large diverticula have been treated by the

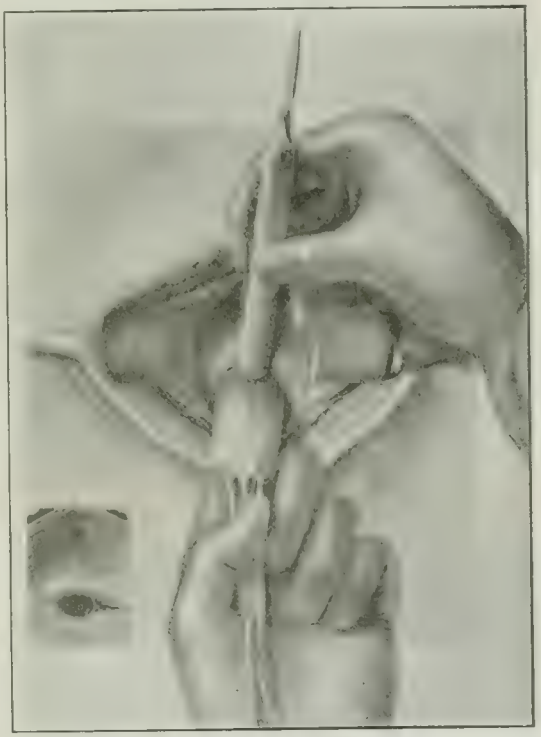

Fig. 3. Ring of diverticulum has been incised. Dotted outline indicates incision which is made through mucous membrane around orifice. The lining of sac is now removed by blunt dissection.

above described method. The diverticulum in each case had a capacity ranging from 400 to 600 c. c.

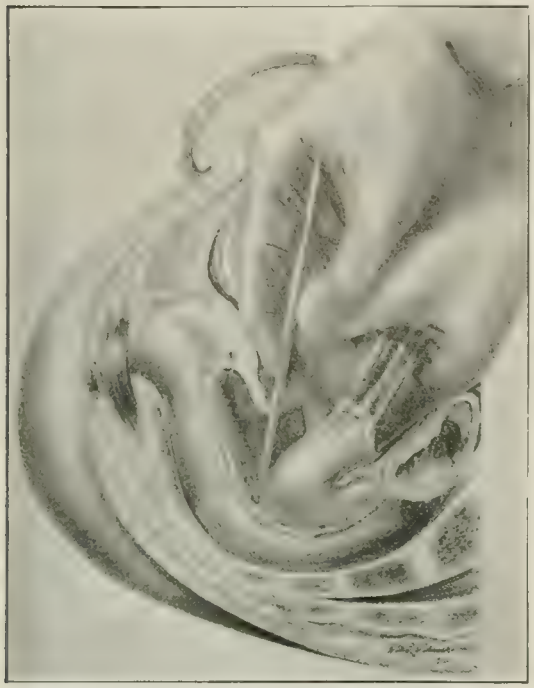

Fig. 4. Side view showing how sac strips from fibrous outer coat.

Fig. 5.—The sac having been excised, the incision of the diverticulum ring is closed and a small tube placed in bottom of cavity through original diverticulum orifice. The bladder is now closed around the two tubes, the large tube being in bladder.

INDICATIONS FOR OPERATION

The presence of a diverticulum either large or small is no indication in itself for its removal. It is only when the di-

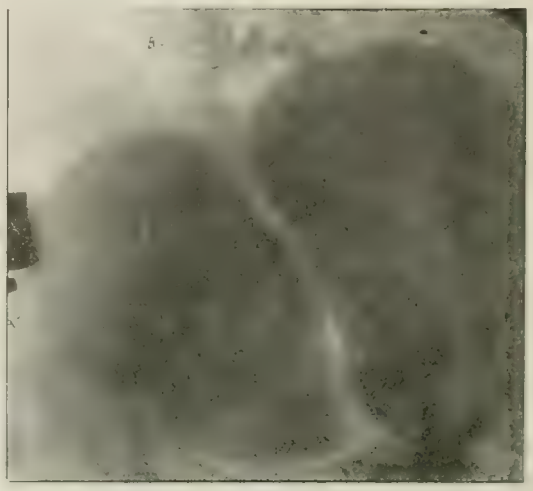

Fig. 6. Cystogram showing bladder "A" and diverticulum "B," the diverticulum being considerably larger than the bladder itself. Diverticulum held 600 c. c.

verticulum, because of certain complications, is the cause of symptoms more or less serious that its removal should be

Fig. 7.—Cystogram four weeks after operation. Note the slight irregularity and bulging of wall at "A."

contemplated. These complications are infection, especially when associated with symptoms of cystitis, obstruction and stone.

CONCLUSIONS

The above described technic, while most necessary for the removal of large diverticula, may, with equal success, be employed in the treatment of small sacs. The

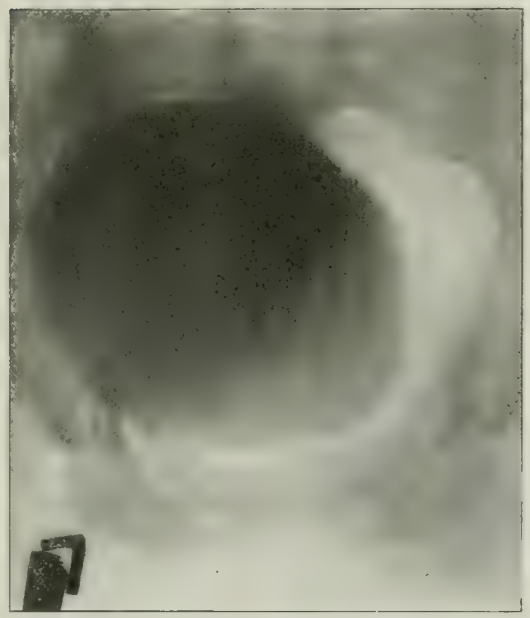

Fig. 8.—Cystogram six months after operation. The slight bulging as shown in Fig. 7 has entirely disappeared. No evidence of diverticulum.

operation is one which can be carried out with comparative facility and does not require a long and tedious dissection. It furthermore eliminates the necessity for plastic surgery on the ureter and renders possible the cure of diverticula adherent to surrounding structures which by other means are practically inoperable.

DISCUSSION

Dr. John R. Caulk, St. Louis, Mo.—I was extremely interested in Dr. Geraghty's technic. Since Dr. Young proposed the suction method I think most of us have been trying to remove these things extra-vesically instead of by the method of diverticular dissection and it has been greatly simplified. I have done about seven of these and have done the last three in much the same way Dr. Geraghty has described except that I have dissected around the orifice. It makes a very simple method. In the cases I have had an opportunity to follow afterward, they have all healed except one man. They have no trouble left except a little bleb, as Dr. Geraghty showed on the little cystogram, but one patient showed a rather definite sac several months after the enucleation. He had no symptoms, but I just checked him up.

It occurs to me that we may have trouble from this method because the mucous membrane of this tract grows out, as we all know, and it may grow down again. I do believe in this method and use it, but I am rather guarded about the ultimate outcome of these cases. As Dr. Geraghty says, we should drain this pouch. It is very difficult to put a tube down into the sac, and doing this we run a chance of putting it down too far and forming a diverticulum. This method has simplified the technic wonderfully, and instead of its being a long, tedious job, the operation takes only a few minutes.

Dr. A. J. Crowell, Charlotte, N. C.—I would like to know, Dr. Geraghty, whether you take any tension sutures in the muscular wall of the bladder to bring it together. I did not quite understand as to that point.

Dr. Geraghty (closing).—After a good exposure of the diverticulum is obtained, the orifice of the diverticulum is incised. The purpose of this is twofold. In the first place it enables one to discern quite easily the line of cleavage between the submucosa and the fibrous outer layer of the sac, and in the second place it allows the introduction of the hand into the diverticulum, facilitating subsequent manipulations. When the line of cleavage between the outer and inner layers has been obtained, a circular incision is made around the neck of the sac. The freeing of the mucosa and submucosa from the outer layer is mostly continued by blunt dissection and it is remarkable with what ease the separation can be carried out.

Dr. Caulk's suggestion that the epithelium may possibly grow and reline the sac is very improbable. In the cases in which this procedure has been carried out there has been rapid obliteration of the diverticulum sac, as can be seen from the cystograms which have been shown.

The operation is one which can be carried out in both the large and small diverticula with equal facility.

EYE, EAR, NOSE AND THROAT

SOME OBSERVATIONS ON THE RADICAL MASTOID OPERATION*

By John H. Foster,
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Houston, Tex.

Twelve to fifteen years ago the radical mastoid operation was at the crest of its popularity. Every otologist was attempting it. Any patient who came into the clinic with a chronic discharging ear was apt to be instantly advised that an operation was his only hope and the procedure could be witnessed any day in visiting the operative clinics. Today the operation is relatively infrequent and some otologists say they rarely make use of it. What is the reason for this change? It is to a consideration of this question that I propose to devote a brief time, and I hope thereby to bring out a frank discussion from the members of this Section.

The reasons for the infrequent use, or abandonment, of the radical operation by many men appear to be embraced under the following heads:

1. The few cases of chronic suppurative otitis media today as compared with the number seen in earlier times.
2. The efficacy of conservative treatment and operations.
3. Unsatisfactory results from the radical operation.

That chronic purulent otitis media is a much rarer condition today than it was ten or fifteen years ago is a fact that any otologist of experience will confirm. Then a large per cent of ear cases applying for treatment were afflicted with a chronic discharge, while today the proportion is relatively small. There is no stronger evidence of the value of the early care of acute otitis media and attention to the causes predisposing to it than is seen in the gradual, and we might say rapid, diminution in the number of chronic cases encountered. No acute case should be allowed to become chronic and unquestionably under ideal conditions the necessity for the radical operation should become insignificant.

Nor can it be gainsaid that many chronic cases now yield to conservative methods that were formerly subjected to the radical operation. Unquestionably, thousands of radical operations were done on cases that could have been relieved by conservative means, and when the first flush of enthusiasm for a new procedure had died down men settled down to a saner consideration of the subject with the result that they became slower to advise a radical procedure before making a thorough attempt to effect a cure by other means. Most of us have seen cases that at first examination seemed hopeless from a conservative standpoint yield to such means as the removal of polyps or adenoids, careful and systematic cleansing, the use of suction, vaccines, etc. In other cases that did not respond to these measures a simple mastoid operation, or the so-called "Heath operation," avoiding some of the dangers of the radical procedure, has sufficed to bring about cure with good hearing where this has not already been seriously affected.

But after eliminating these cases that we have found will yield to conservative treatment, there remains a not inconsiderable number of cases with a persistent discharge of fetid odor, some with headaches and dizziness, some without. In these the radical operation is indicated and should be done with the assurance of a good result.

Let us consider briefly why unsatisfactory results follow the radical operation and how best we may obviate them.

Two criticisms are heard of the operation:

1. That the discharge persists after the operation.
2. That after healing there are troublesome recurrences.

In regard to the first complaint I may say that, generally speaking, unless a patient be tuberculous or luetic, failure to

*Read in Section on Eye, Ear, Nose and Throat, Southern Medical Association, Fifteenth Annual Meeting, Hot Springs, Ark., Nov. 14-17, 1921.

get a dry ear indicates either an incomplete operation or faulty after-care. The radical mastoid operation is one of the most difficult and delicate in surgery and one in which attention to the details of the technic are of vital importance. Cholesteatoma cases are a snare for the unwary. When the cheesey material is removed the cavity appears round and smooth and invites us to leave it as it is, but unless the bone be removed well beyond this, recurrence is very prompt. If infected cells under the facial ridge be left, discharge will persist. Without going further into details we may say that thoroughness is the keynote to success in this work.

Even where a clean operation has been done failure to get a dry ear may result unless the case be kept under observation until complete epidermitization has taken place. Granulations spring up, become exuberant and keep up a discharge indefinitely unless removed or cared for. I may say in passing that I know of no better way of hastening healing and getting a good wound than by using the primary skin graft. I began the use of this method with reluctance and serious doubt, but the experience of a number of years has led me to make it a routine procedure. Here again, however, attention to details is essential. It is no small art to secure good grafts and place them in position so that they will grow. When successful, healing is more prompt and hearing better than when the ear is allowed to become covered with thick granulations.

Recurrence of discharge is observed in every one's cases at times, even after thorough healing. As a rule, these fall into two classes:

1. Those where infection comes up from the nose and throat through a patent eustachian tube. This is an acute infection and can be treated as such with prompt subsidence. Attention to the nose and throat is as necessary in these cases as in any other acute ear infection.

2. Those cases that come back with a foul discharge and more or less of the cavity raw and granulating where it had previously been covered with good epithelium. These cases are due to the rapid exfoliation of the new and poorly nourished epithelium covering the bone. If a case be seen from time to time for two or more years following the operation and the ear cleaned out this condition can, as a rule, be avoided. When it does occur it may take some little time to get it dry and secure re-epidermitization, but the condition is never so grave as the amount of discharge and the odor would lead one to believe at first. Of course, if remains of cholesteatoma wall are present, only removal of that will effect a cure.

Reinfection through the eustachian tube leads naturally to the consideration of the question of attempting to close the tube at the operation. There is considerable diversity of opinion on this subject. Formerly practically all operators made an effort to cause the tube to close and were successful in a certain percentage of cases. Now many men do not touch the tube. I must confess that this is one point in the radical operation where I am in doubt. I believe that successful closure of the tube is desirable, but that if failure results it were often better if the tube had been left alone. Despite what others may say, I have found some cases where repeated cauterization and curettage have failed to effect a closure of the tube. In such cases a granulating pocket results that causes a great deal of trouble.

In conclusion, I wish to say that this operation has been much abused and often improperly applied. It is not indicated in, or advised for, acute conditions, except in rare cases; nor is the recurrence of a discharge from an ear at intervals an excuse for this procedure. The doing of a radical operation in a case where a simple mastoid is all that is indicated is almost criminal. On the other hand, I wish to emphasize the belief that this operation is one of the most valuable sur-

gical procedures at our command, and that we should be culpable in allowing without protest a patient to subject himself to the danger incident to a chronic involvement of the bone of the attic and mastoid, when this can be obviated by this operation.

417-423 *Kress Bldg.*

DISCUSSION

Dr. O. H. King, Hot Springs, Ark.—Dr. Foster has called our attention to the fact that the radical mastoid operation is much less frequently done than it was twelve or fifteen years ago. This, in my opinion, is another evidence of the advance our profession has made in this campaign for higher standards among its members and the education of the laity in measures of prevention. We are handling acute conditions better, and this in turn prevents so many of the chronic discharging ears that were seen twelve or fifteen years ago. We are also, through this campaign of education of the laity in preventive measures, getting fewer cases where "ear drops" have been used at home — sweet oil and lard (so often not sterile). If the drum membrane ruptures when such drops are being used, there is the added infection which makes the handling of the acute case harder. But we are not forced to advise so many of our patients now that an operation is the only way out. The fact that the radical mastoid operation has not been attended with average satisfactory results is responsible, I believe, for greater advance being made in preventive measures.

Dr. Martin E. Taber, Dallas, Tex.—One point Dr. Foster made is of the greatest importance to any man doing this work, and that is regarding whether we distort the eustachian tube or not. That is something we as specialists should think about. The next question is diagnosis, and when is the radical mastoid operation indicated. In 1898, I did twelve radical mastoids in the one year, exposing the lateral sinus as I was taught to do. We had many more brain conditions and brain abscesses during those developmental days when we used to expose the sinus to see whether there was infected blood in it. We had many cases of lateral sinus thrombosis, where now we have scarcely any. It took me ten years to learn something about the real mechanism of the internal ear.

The keynote of the paper is extreme conservatism, yet we have in our midst men who are just as radical as twenty years ago, advocating and reading papers in favor of radical mastoid surgery.

I have come back to the belief that there is a whole lot in the old home treatment with sweet oil. I heard a pediatrist tell how frequently he had to "cut" ears, but I would say if the ear is not punctured properly it had better be left alone. I do not believe it is the pediatrist's business to incise the drum. I would rather trust to a baby's drum membrane's rupturing with ear drops than to let some of these fellows do it. They go in through the drum membrane into the internal ear, cutting upward, and leave it open for infection.

Dr. W. Likely Simpson, Memphis, Tenn.—There are two or three points in Dr. Foster's paper which I would like to emphasize. First, it seems to me that in quite a large number of cases of chronic suppurative otitis media with good hearing, the semiradical operation is to be preferred rather than the radical.

The Heath or Bondi operations are indicated in cases with small perforations and good hearing. If these operations are not successful in bringing about a dry ear the radical operation can be done later.

There are many cases in which the radical mastoid operation is indicated and of course in such cases a thorough operation should be performed. Lowering of the facial ridge is a very important step.

Personally, I like to curette the tube and trv to close it. In a good many cases I think you can use the primary skin graft, and if you do that you will very likely get better hearing than if you allow granulations to cover over the wall and cause a scar later.

Dr. J. A. Stucky, Lexington, Ky.—There is a cause for chronic discharge from the ear. Ascertain what the cause is and remove it, if possible, without doing a radical mastoid operation. This question was threshed out recently at the American Otological Society, at Atlantic City.

Personally, for the past few years I have been getting very satisfactory results by giving my patients the same care before operating that we usually do after operating in order to stop the discharge. Usually in a case of chronic suppurative otitis media the drum membrane is gone, or partially so; the middle ear cavity is full of granulations and foul pus; and a part of the necrotic incus and malleus is feeding this suppuration. Why not remove that? Get rid of the necrosed incus and malleus. If necessary, remove the edge of the tympanic ring so as to get unobstructed drainage of the attic and then cleanse it with antiseptics not destructive to healthy tissue. After cleansing and drying the diseased area, apply with a flexible cotton carrier a 10 per cent mercurochrome, 220 solution, once or twice a week for a while, have the patient use an antiseptic treatment at home, consisting of a 50 per cent alcohol in 1-4000 solution of bichlorid of mercury instilled into the ear twice a day.

I believe we have been doing too many radical mastoid operations, and we get better results by giving careful, conservative treatment to the ear without resorting to operation.

Dr. Clarence De Weese, Lexington, Ky.—I have been associated with Dr. Stucky for eighteen months, and if I remember rightly we have had eighteen cases similar to that described. In none of these cases has it been necessary to do a radical mastoid, and the results have been most gratifying.

Dr. John F. Rowland, Hot Springs, Ark.—It was in 1914 that the pendulum swung to its

greatest extreme in the radical operation, when one of our distinguished otologists read a paper in which he expressed himself that "every case of chronic suppurative otitis media with a foul discharge should be operated radically." We know from experience that many of these cases get well from treatment as suggested by Dr. Stucky, and I have successfully used the mercurochrome in a great many cases, after having cleared up the epipharyngitis and salpingitis. I believe it was Dr. Ballenger who stated that all central perforations of the drum membrane indicated tubal infection and marginal perforations signified necrosis. My observations in many instances verify that statement.

Dr. Robert Caldwell, Little Rock, Ark.—A patient is sent in from fifty to a hundred miles away suffering with suppurative ear trouble that he has had for fifteen years. He comes with his mind made up to undergo whatever treatment we deem necessary. More than likely he is prepared for an operation. Sometimes on examination we find a little granulative tissue or suppurative trouble and decide he does not need an operation. We give him mercurochrome, bichlorid, alcohol, or whatever local treatment we think best and send him home. But we never let the patient go home without telling him some of the things he must expect and be looking for if the ear gets serious. I tell him if he begins to have dizzy spells, gets sick at the stomach, has severe headache on that side of the head or especially if that side of the face gets in the least paralyzed he must immediately consult a specialist.

Within the last six months I have operated radically upon two mastoid cases of such nature. One had a slight facial paralysis. The other had a well advanced paralysis. Both were very dizzy. These patients were entirely relieved by the radical operation.

Dr. Leonard Keplinger, Waxahachie, Tex.—This paper of Dr. Foster's is along the same line I have been fighting for many years. I remember some fifteen or sixteen years ago, at a meeting of the North Texas Medical Association in Dallas, the radical operation was recommended in every case of chronic suppuration of the ear. I had just come out of the clinics of New Orleans and I was convinced that it was wrong, because we had been doing it there, and I determined when I got out I would take a more conservative course. I found I was curing more of these cases by conservatism than these men who did the radical operation, and that I was securing better hearing. I remember one case, a woman who was very deaf, came into my office, and on examination after cleaning the ears out I saw the stapes was bent over and a sharp bone sticking out. I concluded to remove it, and I took a small curved knife and took it out. She got along all right and now she can hear ordinary conversation.

I have never done a radical mastoid unless I was sure there was nothing else to do. I have not put them off too long, but I am sure I never did one too quickly.

As the doctor said, in operating upon children the operation of stabbing the drum membrane should be condemned. I want to emphasize that. Make a circular flap through the drum membrane and that will stay open. If you stab the drum membrane and wound the anterior wall of the middle ear, you increase the inflammation and the incision will close up and the next day you will have to operate again. I operated upon a case that had been operated upon six or seven times by the same man in Dallas. I made a circular incision and instructed the people how to keep it clean, and in two weeks the child was well.

I am very glad to hear such an aural surgeon as Dr. Foster coming forward now to help educate us doctors in the field in conservatism in operating upon these cases.

Dr. Homer Dupuy, New Orleans, La.—The trend of the discussion would seem to show that in a few years the radical mastoid operation will have passed into oblivion. We can certainly hasten such an end if we will be more thorough in our treatment of chronic middle ear suppuration. This can be done both through the external meatus, and especially through the eustachian tube. Ossiculectomies, tonsillectomies and adenoidectomies do not solve the whole problem. We should utilize the eustachian tube to treat chronic middle ear suppurations. We can use the eustachian catheter to instill silver solutions into the upper end of the eustachian tube. If any one is skeptical regarding the feasibility of this method several drops of argyrol through the eustachian catheter driven by compressed air will quickly show itself in the middle ear and be seen through the perforation. If we use the eustachian tube as a route for treatment we can still further reduce the number of radical mastoid operations. And even if indications point to the radical, post-operative treatment through the eustachian tube will prove very effective in many cases. I know that treatment by this method has certainly reduced my number of radical mastoid operations.

Dr. Eugene L. Myers, St. Louis, Mo.—I was forced into the conservative treatment by the refusal of the patient to undergo the radical, and it has taught me that you can cure some of these cases by using the ordinary surgical antiseptic methods. It struck me that inasmuch as iodoform has been used successfully in the osteomyelitides, it would be well in these chronic suppurations of the ear where one has osseous necrosis.

I have used the long, slender silver cannula advocated by Holmes and Dixon, placing it into the eustachian tube in conjunction with the nasopharyngoscope, and injecting through it a solution of iodoform emulsion in glycerin. The middle ear is also filled with the same solution and this is forced down through the tube by positive pressure, using a Siegel otoscope.

One must watch for posterior sinus infection, warning the patient of the danger of reinfecting his ear by the too violent or improper method of blowing the nose. The use of suction in the middle ear with the gauge at 5 m.m. is an excellent adjuvant to withdraw pus from the middle ear and causes a hyperemia.

Dr. Foster (closing).—I would not take issue with any one who advocates conservatism in doing a radical mastoid operation on any case that would get well without it. I know of no question where the application of common sense is of greater importance than in the decision of whether or not a radical mastoid should be done.

The question of skin grafting was mentioned. We make a routine procedure of using skin graft in all cases where we do not think it is contraindicated for the reason that it helps healing, gives a good wound, and less after-care is necessary.

The conservative operations spoken of by Dr. Simpson certainly are valuable.

I would have to accept Dr. Stucky's treatment by ossiculectomy with some reserve. I am sure that good results have been obtained by ossiculectomy, but I have always been under the impression that the cases that got well by ossiculectomy would have gotten well any way. However, I am perfectly willing to be convinced.

Dr. Caldwell spoke of patients coming from a distance, and that is a very serious question, the handling of out-of-town patients. Sometimes we have to make up our mind that a radical operation is necessary in a case that does not live in our own community, where we would not operate were the patient under our observation.

In regard to Dr. Dupuy's use of the eustachian catheter, I think that a case that can be cured by treatment of the eustachian tube is not a subject for radical operation. The radical operation is indicated where the disease has affected the attic of the mastoid and the bone.

I have had no experience with iodoform, but I am sure it has value, and I shall be glad to use it.

THE RELATIONSHIP OF THE OCULIST AND AURIST TO GROUP MEDICINE*

By R. H. T. Mann, M.D., F.A.C.S.,
Texarkana, Ark.-Tex.

The individual practitioner, either in general practice or in some of the specialties, stands today where the private school teacher stood a century and the individual banker stood half a century ago. It is to be doubted exceedingly if physicians in all lines are meeting the demands of society better than did the two above-named classes meet the demands at the periods mentioned.

What per cent of our population from financial or other reasons have at their disposal adequate medical service? In many of the so-called medical centers from one cause or another the diagnosis and treatment are below what the standard should be. If this is true of these centers, then what is to be said of the great rural districts and the smaller centers?

Our profession has made greater and more rapid strides than any other in the last twenty-five years. Because of these rapid advances many things which have at the time appeared revolutionary have, as a matter of fact, been quite evolutionary steps. This evolution has been more rapid than it would have otherwise been because of the war.

Group medicine in civil practice is far different from group medicine in the Army. Groups in the Army were under military control. In civil practice they are at best only loosely organized. For this reason many failures are to be expected. All things considered, the many advantages of group practice from both the standpoint of the community and physician far outweigh its disadvantages. If expanding medicine is to in any sense meet the growing demands placed upon it, it can only be done by group practice.

In considering the brief discussion of this subject, I have divided these groups into three classes:

Group No. 1.—The unorganized group where several men work together. Each man does all the work he can in his own line, and often attempts things outside his line, for which some one of his colleagues is far better fitted to do than himself. A good illustration of this group is the staff of almost any average hospital.

Group No. 2.—A firm organized into a partnership with assistants, offices and office equipment necessary to diagnose and treat diseases in all lines. They have

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connection with one or several hospitals. Illustrations of this group are to be found now in almost any city. Many of these groups are doing excellent work.

Group No. 3.—A corporation organized as any other corporation with a President, Vice-President, Secretary-Treasurer and Board of Directors, with capital stock sufficient to own and operate its own clinical buildings and hospitals. This corporation should be owned or controlled by the staff. The members of the staff should be paid both a salary and a commission, depending upon the earning capacity of each department. This, to my mind, is the best and most satisfactory way to organize a group on a firm and solid foundation. It gives the group an unhampered place to do its work, allowing it to put into any phase of the work the same individuality and initiative that an individual does.

It is a mistaken idea to think that a corporation has no soul and no individuality. Groups organized under this plan are meeting the largest measure of success all over the country, and, strange as it may seem, very many of them are located in small towns, where some at least have attained national and international reputations. This wholly disproves the old idea that the best work can be done only in large cities where there is an abundance of clinical material, and where large hospitals are located.

In my opinion the best, or at least the second best, operated corporation in America is controlled and managed by physicians, which upsets another old theory that physicians are poor business men, and for that reason can not and should not manage their business affairs.

The oculist and aurist is confronted with the perplexing problem whether or not to join a group. If he should become a member of a group which failed, then his position with the profession is much weakened. It seems in some instances that he might do the work in his special line for more than one group. This looks well in theory. It works poorly in practice, however.

Whether or not to join a group is an individual question, and has to be settled individually after a full survey has been made of the situation from every angle.

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EDITORIAL DEPARTMENT

SOUTHERN MEDICAL ASSOCIATION
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THE GORGAS MEMORIAL

Never before in history has there been undertaken the establishment of an international memorial of greater usefulness than that which has been planned to perpetuate the name and fame of a great Southerner, Major-General William C. Gorgas. It is fitting that a great memorial should be erected to him by all the nations of the world, because there are living today hundreds of thousands of persons who would have died, and in the centuries to come there will live millions who would not have been born had it not been for the work that he did in Cuba and in Panama in the prevention of tropical diseases, which up to that time were spreading to all parts of the earth. We should also not forget that, as ex-President Taft expressed it, "the sanitation of the Canal Zone by Gorgas made possible the completion of the Panama Canal, the greatest industrial undertaking in the history of the world."

The South more than any other section of the United States will be interested in a great memorial to General Gorgas, because our people have profited most by his achievements and we will receive the greatest benefits from the memorial which will be established in his honor. The people of the South should never forget that it was an Alabamian who for the first time freed Havana and the Canal Zone from yellow fever, because those who can remember two or more decades will recall the almost yearly epidemics of the dreaded "yellow jack" that visited our Gulf and Atlantic cities, paralying the commerce of the South during the summer and autumn months almost every year.

We of the South shall not forget what Gorgas did for us, and as a matter of simple gratitude we should do most to establish a great memorial to him; and we should be most interested in the proposed memorial because if successful it will do more for the agricultural and industrial development of the Southern states than anything which has been done since the eradication of yellow fever from Cuba and Panama. General Gorgas himself saw this when he said: "With the elimination of tropical diseases the tropics will become the future centers of industry and population of the world." Before this becomes true, as it surely will in the centuries to come, the South will become the great agricultural and industrial center of the United States. General Gorgas proved his assertion that "It is cheaper to live and protect one's family from tropical diseases in the South than to buy fuel and build air proof houses to protect against the cold winters of the North."

The proposed Gorgas memorial will consist of two complementary institutions, i. e., "The Gorgas Institute of Tropical Diseases and Preventive Medicine" in Panama, and "The Gorgas School of Sanitation" in Alabama. The Institute in Panama, which was the scene of his greatest achievement, will be largely for research work in tropical diseases, a place

where men from the medical schools and laboratories from all over the world may go to study the life history of, and develop methods for preventing, tropical diseases; while the school at Tuscaloosa, Ala., the home of General Gorgas and near the spot where his father and mother are buried, will be for the purpose of training practical sanitarians for which there is great need at this time.

The history of the development of the Gorgas memorial can not be outlined in a brief editorial, nor can the detailed plans for the work of the Institute in Panama and the School in Alabama be described in a few paragraphs; but the mention of the names of the men who are sponsoring the movement is sufficient assurance that the Gorgas memorial will be a practical success. The following Board of Directors has been selected to raise and control the funds for the Gorgas memorial in all its activities:

Dr. Belisario Porras, President of the Republic of Panama; Dr. A. S. Boyd, Chief of Surgical Service, Santo Tomas Hospital, Panama; Hon. John Bassett Moore, New York; Hon. Leo S. Rowe, Director-General, Pan-American Union; Surgeon-General M. W. Ireland, U. S. Army; Surgeon-General E. R. Stitt, U. S. Navy; Surgeon-General H. S. Cumming. U. S. Public Health Service; Dr. Franklin H. Martin, Chicago, Ill.; Rear-Admiral W. C. Braisted, Washington, D. C.; Dr. Seale Harris, Birmingham, Ala.; Dr. Oscar. Dowling, New Orleans, La.; Dr. E. G. Williams, Richmond, Va., and Dr. Frank Billings, Chicago, Ill.

The following men constitute the "Scientific Committee" which will outline the work that is to be undertaken both in Panama and in Tuscaloosa, Ala.: Dr. Richard Strong, Professor of Tropical Diseases, Harvard University, Boston, Mass.; Col. F. F. Russell, International Health Board, New York; Rear-Admiral E. R. Stitt, Surgeon-General, U. S. Navy; Col. Jos. F. Siler, U. S. Army; Dr. Geo. W. McCoy, U. S. Public Health Service; Dr. S. W. Welch, State Health Officer of Alabama; Dr. W. S. Leathers, Director of Public Health for the State of Mississippi.

It is proposed to raise as a minimum from five to seven million dollars for the Gorgas memorial. The Republic of Panama has already given the land and will construct a building for the Institute of Tropical Diseases representing an investment of more than $400,000.00. The governments of other Central and South American republics will also donate funds for the Panama Institute. Since General Gorgas served the British Government in South Africa, it is thought that philanthropists in England and in other British countries and colonies will be liberal contributors.

The methods of raising funds in the United States will be carried out much as were the Red Cross and Liberty Loan drives during the war. Every county in each state in the Union will have committees appointed to raise funds for the Gorgas memorial. Since physicians know best of the debt the world owes to General Gorgas, and since they also realize more than any class of people the good that will accrue to mankind from the establishment of the complementary institutions in Panama and in the South, they will take the leading part in raising the funds of the Gorgas memorial. They also will consider it a privilege to contribute as liberally as they can to such a cause.

The Southern Medical Association, of which General Gorgas was an enthusiastic member, at the Hot Springs meeting unanimously adopted resolutions endorsing the Gorgas Memorial and pledged its co-operation in every way possible in the establishment of the Gorgas Institute of

Tropical Diseases and Preventive Medicine in Panama and the Gorgas School of Sanitation in Alabama. Its members will lend their best efforts to place the South in the forefront in erecting this fitting and beneficent memorial to the greatest sanitarian in the history of the world, and they will take delight in honoring a man who was proud to be known as a Southerner.

VAGINAL DRAINAGE

Some one has remarked that he who could thoroughly understand drainage and intestinal obstruction would know surgery. At all events, they are twin problems of the greatest importance to the surgeon and there is reason to believe that they will continue for years to furnish favorite topics for discussion.

Some years back when asepsis was not so thoroughly practiced, drainage was necessarily more often resorted to than at present. It is safe to say that the surgeon of today does not drain a third as many cases as he did ten or fifteen years ago. Each year finds him closing more and more abdomens tightly. And in the main the patients are better for it.

The peritoneum's capacity for absorbing exudates is well known, and even its ability to handle some infections is clearly demonstrated by the extensive, old adhesions often encountered at laparotomy, showing where the peritoneum has fought a hard battle and emerged victorious. We recognize this faculty when we close the abdomen tightly after gastroenterostomies or intestinal surgery when contamination of the peritoneum is usually inevitable.

When to drain and when not to drain still are incapable of being expressed by set rules. It is the ability to decide such questions as this that constitutes surgical judgment. However, the maxim still holds good: "When in doubt, drain." But the more experienced one becomes, the less doubt will there be felt and the less often will drainage be instituted.

As is well known, abdominal surgery is more common in the female, and likewise may be often handled differently in that sex. Particularly is this true in pelvic cases. The general surgeon is prone to shun vaginal drainage even though from time to time he may observe his colleague, the gynecologist, employing it most successfully. It is this fact that called forth this editorial.

There is no mystery about vaginal drainage. The drain, usually of the cigarette type, may be inserted either into the open stump of the vagina following hysterectomy, or into a transverse puncture made in the cul-de-sac just back of the cervix, between it and the rectum. There is ample room for it and no fear need be felt provided there is no distortion of the normal structures by complicating new growths or by the interposition of intestines, tubes, ovaries, etc., through adhesions.

The dependent position of the opening, the fact that the abdominal wall can be completely closed and thus free from the added danger of post-operative hernia, the fact that the vagina readily lends itself for the conveying of discharges, and the fact that the vaginal mucous membrane heals over with ease when the drains are removed, are features worthy of careful consideration.

Particularly is vaginal drainage the method par excellence in those cases of tuberculous peritonitis in the female where it is felt that due either to extensive oozing of blood from the raw surfaces or to the presence of pus, some sort of drainage must be instituted. A protracted sinus is much less likely to become a complication in vaginal drainage

than when the abdominal incision is drained. In the case of tuberculous peritonitis, the advantages of the vaginal drainage route can scarcely be over-emphasized. It is hardly necessary to explain that the above does not alone refer to operations per vaginam, but particularly to vaginal drainage in laparotomies.

CANCER OF THE TONGUE A PREVENTABLE DISEASE

One of the inspirations of modern medicine is the rapidity with which diseases are being added to the preventable list. Smallpox has been conquered for so long a time as to attract little or no interest nowadays. Diphtheria has been markedly checked. By the application of scientific principles rabies has become entirely eradicated from the British Isles, and yellow fever from the Canal Zone. The typhoid incidence is fast lessening and medical students of the next generation will hardly encounter in works on the practice of medicine anything like the forty-six pages which Osler devotes to the subject.

Surgically, it is pleasing to note that recent years have yielded a prevention for simple colloid goiter[1] by the intermittent use of small doses of iodin salts. Chronically discharging ears are far fewer in number since the onset of middle ear disease is borne in mind and watched for and the accumulation liberated at an earlier time. This has also greatly obviated the necessity of so many radical mastoid operations.

Cancer of the skin is clearly a preventable disease. Cancer of the uterus, which in the vast majority of instances arises in the cervix, is largely a preventable condition. It "usually attacks women who have borne children and who, therefore, have had an examination and should not shun it."[2] If all pronounced injuries of childbirth were repaired at once or in the near future, and if every woman who has borne children were to undergo a periodic examination by her obstetrician or surgeon, especially if any abnormal discharge or bleeding occurs, cancer of the uterus would be greatly reduced in incidence.

Now comes Dr. Joseph C. Bloodgood, of Baltimore,[2] [3] who presents statistics of 265 varied tongue lesions in men and 33 in women, and proceeds to show that cancer of the tongue is purely a preventable condition. He analyzes 160 cases of cancer of the tongue recorded in his own and Halsted's clinics and announces some rather significant and surprising figures. He found that in 6 cases the histories were too incomplete to be of great service, but that in 154 (96 per cent of the malignant cases) there was a definite history of "precancerous lesions," i. e., lesions which were previously recognized as abnormal by the patients themselves. In the order of their frequency they were: bad teeth, ulcers, leukoplakia, area of irritation, wart, fibroma, smoker's burn, and syphilitic gumma.

Among the 160 malignant tongues, all their owners used tobacco and usually to excess, except two and they both had bad teeth, which had produced areas of irritation for years. The small number occurring among women was invariably in the mouths of those who used tobacco to excess and usually in the form of snuff by mouth. It is the excess of tobacco and not the mode of its use which is conducive to cancer of the tongue.

Significant also is the statement that all the 160 case histories recorded bad teeth but 3, and the latter stated that the teeth

1. Editorial: Southern Medical Journal, xiii, 5, May 1920, p. 389.

2. Bloodgood, J. C.: Jour. Am. Med. Ass'n., lxxvii, 18, Oct. 29, 1921, p. 1381-7.

3. Bloodgood, J. C.: Jour. Am. Md. Ass'n., lxxvii, 3, July 16, 1921, p. 220.

Bloodgood, J. C.: Southern Medical Journal, xiv, 12, December, 1921, p. 990-6.

were good. But the accuracy of this last observation is brought into question by the further statement that one of these had had for seven years an area of irritation on the tongue which impinged upon the teeth. The other two smoked pipes and one had noticed an ulcer on the end of his tongue for six months and the other for a year. Both the latter suggest burns.

In summarizing, then, cancer of the tongue is essentially a disease of neglected oral hygiene, as it occurs in persons with mouths chronically irritated by infected or jagged teeth, or who are guilty of the excessive use of tobacco. Usually both factors are present in combination. A precancerous warning manifests itself in time for the danger to be averted by the prompt discontinuance of tobacco and the remedying of the dental defects. If the lesions do not then rapidly disappear, they should be excised with a wide zone of healthy tissue, except in the case of leukoplakia which may take as long as three or four years to disappear. However, it, too, is to be excised if it becomes cracked or ulcerated. These facts but emphasize the importance of periodic routine physical examinations for all.

In announcing the preventability of a dreaded disease like cancer of the tongue, which in the past has always shown so high a mortality and such mutilation possibilities, Dr. Bloodgood has made a noteworthy contribution to preventive surgery. How different in its guidance and usefulness is Dr. Bloodgood's message of hope from that of Dr. L. Duncan Bulkley,[4] of New York City, who is most critical of surgery in malignancy and who actually claims that cancer may be cured at times even in advanced stages by a suitable vegetarian diet, by hygienic measures, and by certain drugs such as potassium salts.

4. Bulkley, L. Duncan: "Cancer and Its Non-Surgical Treatment." New York: Wm. Wood & Co., 1921.

A CORRECTION

In the editorial on digitalis therapy published in last month's JOURNAL, a gross typographical error occurred. In the review of Dr. G. Canby Robinson's paper it was stated that Dr. Robinson gave the results of 10 cases of cardiac disease treated with digitalis. This should have been 100 cases. Since in the next paragraph of the editorial his results with 26 cases of auricular fibrillation and with other cases without auricular fibrillation were discussed, some confusion over the discrepancy must have arisen in the minds of the readers.

A second error occurred in the substitution of the word "pounds" for "kilos" in the parenthesis referring to pounds of cat weight which should have been "kilos of cat weight." This does not affect the description of the dosage for man.

OFFICERS SOUTHERN MEDICAL ASSOCIATION 1921-1922

The following is a complete roster of the officers of the Southern Medical Association for 1921-1922:

President

Dr. Seale Harris, Birmingham, Ala.

First Vice-President

Dr. W. A. Mulherin, Augusta, Ga.

Second Vice-President

Dr. W. T. Wootton, Hot Springs, Ark.

Secretary-Manager

Mr. C. P. Loranz, Birmingham, Ala.

Editor of Journal

Dr. M. Y. Dabney, Birmingham, Ala.

Councilors

Dr. H. H. Martin, Chairman, Savannah, Ga.
Dr. A. W. Ralls, Gadsden, Ala.
Dr. Wm. R. Bathurst, Little Rock, Ark.
Dr. Cary T. Grayson, Washington, D. C.
Dr. R. H. McGinnis, Jacksonville, Fla.
Dr. J. A. Stucky, Lexington, Ky.
Dr. J. E. Knighton, Shreveport, La.
Dr. Hiram Woods, Baltimore, Md.
Dr. F. J. Underwood, Jackson, Miss.
Dr. O. H. McCandless, Kansas City, Mo.
Dr. Jos. B. Greene, Asheville, N. C.

Dr. L. J. Moorman, Oklahoma City, Okla.
Dr. J. W. Jervey, Greenville, S. C.
Dr. Wm. Litterer, Nashville, Tenn.
Dr. Oscar M. Marchman, Dallas, Tex.
Dr. Ennion G. Williams, Richmond, Va.
Dr. T. W. Moore, Huntington, W. Va.

Board of Trustees
(All are ex-Presidents)

Dr. Oscar Dowling, Chairman, New Orleans, La.
Dr. Robert Wilson, Jr., Charleston, S. C.
Dr. Duncan Eve, Sr., Nashville, Tenn.
Dr. Lewellys F. Barker, Baltimore, Md.
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Dr. M. L. Graves, Chairman, Galveston, Tex.
Dr. Loyd Thompson, V.-Ch'n, Hot Springs, Ark.
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Section on Neurology and Psychiatry

Dr. E. Bates Block, Chairman, Atlanta, Ga.
Dr. M. L. Graves, V.-Chairman, Galveston, Tex.
Dr. L. L. Cazenavette, Sec'y, New Orleans, La.

Southern Gastro-Enterological Association
(Meeting conjointly with Southern Medical Association)

Dr. Marvin H. Smith, Pres't, Jacksonville, Fla.
Dr. Julius Friedenwald, V.-Pres't, Baltimore, Md.
Dr. J. B. Fitts, Secretary, Atlanta, Ga.

Section on Radiology

Dr. Thomas A. Groover, Ch'n, Washington, D. C.
Dr. Robt. H. Millwee, V.-Chairman, Dallas, Tex.
Dr. E. C. Ernst, Secretary, St. Louis, Mo.

Section on Surgery

Dr. Hugh H. Trout, Chairman, Roanoke, Va.
Dr. Irvin Abell, V.-Chairman, Louisville, Ky.
Dr. J. W. Barksdale, Secretary, Winona, Miss.

Southern States Association of Railway Surgeons
(Auxiliary of the Southern Medical Association)

Dr. Lucius E. Burch, President, Nashville, Tenn.
Dr. W. W. Harper, Vice-President, Selma, Ala.
Dr. J. W. Palmer, Secretary, Ailey, Ga.

Section on Urology

Dr. E. G. Ballenger, Chairman, Atlanta, Ga.
Dr. H. W. E. Walther, V.-Ch'n, New Orleans, La.
Dr. J. C. Vinson, Secretary, Tampa, Fla.

Section on Orthopedic Surgery

Dr. W. Barnett Owen, Chairman, Louisville, Ky.
Dr. Willis Campbell, V.-Ch'n, Memphis, Tenn.
Dr. Fred G. Hodgson, Secretary, Atlanta, Ga.

Section on Obstetrics

Dr. Calvin R. Hannah, Chairman, Dallas, Tex.
Dr. J. T. Altman, V.-Chairman, Nashville, Tenn.
Dr. Jas. R. Garber, Secretary, Birmingham, Ala.

Section on Eye, Ear, Nose and Throat

Dr. H. H. Briggs, Chairman, Asheville, N. C.
Dr. John H. Foster, V.-Chairman, Houston, Tex.
Dr. John J. Shea, Secretary, Memphis, Tenn.

Section on Public Health

Dr. Ennion G. Williams, Chair'n, Richmond, Va.
Dr. C. W. Garrison, V.-Ch'n, Little Rock, Ark.
Dr. Henry Boswell, Secretary, Sanatorium, Miss.

National Malaria Committee (Conference on Malaria)
(Meeting conjointly with Southern Medical Association)

Dr. H. R. Carter, Assistant Surgeon-General, U.S.P.H.S., Honorary Chairman, Washington, D. C.
Dr. W. S. Leathers, Chairman, Jackson, Miss.
Dr. L. D. Fricks, Surgeon, U.S.P.H.S., Secretary, Memphis, Tenn.

Conference on Medical Education

Dr. I. I. Lemann, Chairman, New Orleans, La.
Dr. M. L. Graves, V.-Chairman, Galveston, Tex.
Dr. W. McKim Marriott, Sec'y, St. Louis, Mo.

Southern Hospital Association
(Auxiliary of the Southern Medical Association)

Dr. Stewart R. Roberts, President, Atlanta, Ga.
Dr. Battle Malone, Vice-Pres't, Memphis, Tenn.
Mr. J. B. Franklin, Secretary, Dallas, Tex.

Women Physicians of the Southern Medical Association

Dr. Elizabeth Kane, President, Memphis, Tenn.
Dr. Florence Brandeis, 1st V.-P., Louisville, Ky.
Dr. Iva Youmans, 2d V.-President, Miami, Fla.
Dr. Josephine Hunt, Sec.-Treas., Lexington, Ky.

Book Reviews

Gynecology. By Brooke M. Anspach, M.D., Associate in Gynecology, University of Pennsylvania, with an Introduction by John G. Clark. 526 illustrations and 702 pages. Philadelphia and London: J. B. Lippincott Co.

Dr. Anspach takes up his subject in the very logical order of first a review of the normal organs, then the causes which produce the abnormal, abnormalities dependent upon developmental defects, acquired causes of diseases, general symptomatology, and a complete description of the diseases affecting various parts of the female generative tract.

Wisely enough he does not omit a consideration of the endocrine glands. Among other things, he notes that the pituitary and thyroid glands are both enlarged during pregnancy: the latter enlargement being apparent from the contour of the neck; the former from necropsy findings and from the facial changes in pregnancy which simulate those found in acromegaly.

He closes with a consideration of post-operative complications and radium and roentgen ray therapy, which accords these instruments their due. The operative descriptions and cuts are particularly good, but the whole work is creditable and fully justifies its entrance into gynecologic literature.

Diseases of the Skin. By Richard L. Sutton, M.D., Professor of Diseases of the Skin, University of Kansas School of Medicine; Former Chairman of the Dermatological Section, American Medical Association; Assistant Surgeon, U. S. Navy (Retired); Dermatologist, Christian Church Hospital. 969 illustrations and 11 colored plates. 4th Edition. St. Louis: C. V. Mosby Co., 1921.

Sutton's book reflects the hearty energy of his own personality. It is candid and usually accurate, although opinion is sometimes confused with fact. Among the sections demanding especial commendation is that on skin cancer. Every practitioner, whether specialist or not, could study this with profit.

The new reader is first impressed by the profuse and fresh illustrations, which surpass many professed atlases of skin disease. Apparently the world has been combed for material.

Minutes of Hot Springs Meeting—See next page for complete minutes of that meeting.

SOUTHERN MEDICAL ASSOCIATION

Minutes of the Fifteenth Annual Meeting, Hot Springs, Arkansas November 14-17, 1921

Tuesday, November 15, 10:00 a. m.—First General Session

The Association met in the Auditorium Theater, Hot Springs, Ark., and was called to order by Dr. W. T. Wootton, General Chairman of the Committee on Arrangements.

INVOCATION

Rev. C. E. Hickok, Pastor, First Presbyterian Church, was introduced and delivered the following invocation:

Oh, great Lord God, our Heavenly Father, giver of all good and perfect gifts, we are the recipients of Thy love, Thy goodness, Thy mercy. We acknowledge our dependence upon Thee in all things. At the beginning of our sessions we come into Thy presence, returning our thanks to Thee for all Thy loving kindness, especially that Thou hast given unto us in Thy name to serve humanity. Thou hast given to us the Lord, Jesus Christ, who ministered not only to the souls of men but to their physical minds. Oh! fill us with Thy love that Thou hast manifested and grant that we may carry into our work the same spirit. Be with and bless these men in all their deliberations. Guide them by Thy counsels. Give unto them to see continually in the future, as in the past, the increase of knowledge, and oh! do Thou grant that with all the increase of knowledge it may be dedicated unto Thee.

And we do pray that Thou wilt forgive our sins and when they bring us to Thine own glorious presence, grant that in that day we may hear the voice of Him we love say, "Well done, thou good and faithful servant." And we ask it all in His name and for His name's sake. Amen.

ADDRESS OF WELCOME

Hon. William H. Martin, Hot Springs, Ark., was introduced and delivered the following address of welcome in behalf of the medical profession and citizens of Hot Springs and Arkansas:

Mr. President, Officers and Members of the Southern Medical Association, Ladies and Gentlemen: So long as we are in the heedless enjoyment of good health and free from bodily pain we are prone to disparage the science of medicine and are apt to depreciate its chosen disciples. But when smitten by any of the thousands of ills that the flesh is heir to, we do not need much time in which to recant all such heresies, and implore the speedy assistance of the nearest doctor.

It has always seemed to me that it is the doctors who are God's chosen people. Things are made easy for them. In the great account books of life they take full credit, not only for the cures wrought by their knowledge and skill, but also of the recoveries that would happen in the ordinary course of Nature in any event. And if by some accident or misfortune he should err in the diagnosis or treatment with disastrous results to the patient, even then the doctor does not suffer in fame or reputation, for his mistake lies buried far from the sight of human eyes. How differently fares your unfortunate cousin, the lawyer! If he blunders, the victim proclaims his fault from every housetop and street corner! Or if perchance the results have been really serious, his error is suspended in midair, for all the world to see, as a frightful admonition to the multitude either to behave better or else get a better lawyer.

A scholarly and literary member of your profession was Dr. Oliver Wendell Holmes. Rich in honors and love, he passed a good many years ago, after a life of more than four score years, each of which was a benediction and blessing to all the world. He is and must always be a favorite author with those who love the best in literature. In one of his medical papers I find him saying that excepting one or two remedies, certainly not more than three, if all of materia medica were sunk to the bottom of the sea, it would be all the better for mankind, and all the worse for the fishes. I hesitate to subscribe without reservation to this doctrine, but in the essay I quote from, written some sixty or seventy years ago, he seems to have been a pioneer in the belief that the greatest future of the medical profession was to be found in the effort to prevent illness rather than to cure it.

When we lawyers take note of the marvelous progress made by your profession in the last score of years and compare it with the very slight advance in ours, we can not help paying mental tribute to your learning, research and achievements. Years have been added to the average life as the result of your studies, investigations and endeavors. What other profession, what calling, or invention, what discovery is comparable to that! Of course, there have been none, and even if we should accept Dr. Holmes' pessimistic doctrine as to the efficacy of medicine, regarding it purely as a drug, it still remains perfectly plain that your field of usefulness would be but little circumscribed. For all of us know that if every specific should utterly fail, if the cinchona trees should all die out and coal tar were unknown, if the arsenic mines were all exhausted and the sulphur mines all burned up, if every drug from the animal, vegetable and mineral kingdoms were to disappear from the market, there would still be required a body of enlightened, devoted men, organized into a distinct profession just as you are now, whose province would be to guard against the causes of disease, to eliminate them if possible where still present, to order all the conditions of the patient so as to favor the efforts of the system to right itself, and to give those forecasts of the course of disease which only experience can warrant, and which in so many cases relieve the exaggerated fears of sufferers and their friends, or warn them in season of impending danger.

Nature is the great friend and ally of your craft. And Hot Springs is Nature in a form we trust you will find very fascinating. Meaning to allow full credit to your great profession, the flower of which we have the honor to hold as our guests today, we are still persuaded that the Greatest of all Physicians has caused a boiling water to flow from our mountain side, charged with curative properties that render it effectual in cases where the profession must sometimes despair.

Believing this, Mr. President, it adds to the pleasure we feel in entertaining your great body, so representative of the best to be found in your profession, that you may make a personal investigation and determine for yourselves whether or not in the future you may not sometimes find that you are best serving your patient by recommending a visit to our Valley of Vapors. But after all even the best of water is not much to talk about to a convention of doctors. That is, if the speaker indulges any hope of exciting great enthusiasm or winning much applause. But if possible we ought not to cultivate or cherish any narrow feeling of prejudice, and for my part I sincerely believe that water for some people, say the sick, is well enough even when used as a beverage. But in this, prudence would suggest that it should only be taken under the advice of your physician. And even then, at the risk of uttering heresy, my suggestion would be that it should be taken in homeopathic doses. Perhaps its most useful purposes, say as a "chaser," has, I fear, become obsolete.

I am reminded, Mr. President, that my mission is limited to bidding you welcome. The spoken words which I am commissioned to utter will, however, be speedily obscured by greater evidences, which will appear to you in the cordial treatment, lightened countenance as our people meet and greet you, and the thousand inarticulate ways in which the guest is made to feel the pleasure of the host. But just what need there may be for extending a formal welcome to you is hard to perceive. For if there be a man in all the wide world who is welcome at all times and everywhere, whether his visit be professional or social, it is our good friend, the doctor.

It is so at every stage of life. In the hour of tribulation immediately preceding our advent into this glorious world of brightness, of beauty and of love, when more lives than one lie trembling in the hands of Fate, it is to his steady and confident hand that we commit those dearest to us,

and to his strong, wise face that we look for comfort. Or if it be when "life's fitful fever" is over, when the sands of time have run their course, and the brightness of the day is fading into the twilight preceding night, we lean harder than ever upon him for support, his labors then being twofold in assuaging the pain of the dying and extending sympathy and comfort to those who remain.

God bless the cultured, kind-hearted, friendly doctor! May the final judgment on his life's work be as welcome and as comforting to him as his warm, genial presence always is to us.

RESPONSE TO THE ADDRESS OF WELCOME

Dr. Stewart R. Roberts, Atlanta, Ga., in behalf of the Southern Medical Association, responded to the address of welcome as follows:

Mr. President, Mr. Martin, Ladies and Gentlemen: This welcome to Hot Springs and to Arkansas is like a breath from an older and more courteous time. We have come from as far East as the haunting air of "Maryland, My Maryland" and the patriotic inspiration of Francis Scott Key's upstanding "Star-Spangled Banner," from where William Osler worked and Edgar Allen Poe died. We have come from as far West as the serial land sections and pouring oil wells of Oklahoma, from the uttermost span of the Pan Handle and the country round about El Paso. We are no strangers to the weird invitations of the Everglades and we claim the blue grass region of Kentucky as our own. I mention Kentucky with some conservatism. Omitting any reference to her persuading virtues of liquids, beauties and breeds, the Cavalier has humbled the Puritan, Kentucky has beaten Massachusetts, Center has beaten Harvard, and the fame of Bo' McMillan is rivaling that of Daniel Boone.

We have come to Hot Springs and to Arkansas in the year of the boll weevil and the chiropractor. The boll weevil crossed the tawny waters of the Rio Grande, stalked his snowy destruction to the foothills of the Blue Ridge, and bolled over the financial South. The chiropractor, like the "cooty," is a parasitic irritant to the body scientific, and, like the wind, worketh where he listeth, and one can not tell whence he cometh or whither he goeth. The boll weevil and the chiropractor are both manipulators, the one of the cotton market, the other of the vertebral column.

We have come to the greatest natural health resort in the Republic. We have come to the most resourceful 46,000 square miles of state in the Union. There could be built around the State of Arkansas a wall as high as Haman was hung, and provided there be left an eight-foot opening for a little outside connection with the ubiquitous Henry Ford, Arkansas could support herself from one year's end to another without any outside assistance.

The preceding speaker said that Hot Springs is Nature. Arkansas is a greater Nature. Between Memphis on the east and Hot Springs on the west there are four navigable rivers. We saw one of them filled with enormous logs of hard wood. The timber of Arkansas is nearly untouched. There is coal and cobalt, lead and zinc. There are two million dollars' worth of pearls a year from the White and St. Francis rivers. There are diamonds that Tiffany buys. There is wheat, corn, apples and peaches that make a Georgia peach blush with envy, and I am from Georgia. There is cotton and there is rice that make South Carolina and Louisiana rice sell for less. This is Arkansas. A prophet is not without honor save in his own country and among his own dear people. The Arkansas Traveler has not yet come to the full flowering of his high estate. Like Pershing at Lafayette's tomb in France, "Arkansas, we are here!" and we feel that it is glorious to be an Arkansas traveler.

We have come from a territory of nearly a million square miles. Our region runs from east to west fourteen hundred miles and seven hundred miles from the soothing waters of the Gulf to the cooling waters of the Ohio. It is a territory large enough to include Great Britain and Ireland (and some people think Ireland covers more than a million square miles), the former German Empire, France, Italy, Belgium, Switzerland and Holland, and still have two hundred thousand square miles waiting for the settlement of the Russian problem.

In our area are 46,851 physicians without reference to color or previous condition of servitude, or a little less than one-third of the entire number of physicians in the United States. We have 1,564 hospitals, or about one-fourth of the hospitals in the United States. Like Paul Jones, who said he had not begun to fight, we have not even begun to grow. We have hardly drawn the first full breath of development. This is the second largest medical association in the Western Hemisphere and the most independent on the earth.

Beginning with Baltimore and the fame of Barker and Thayer, we come West through the City of Washington and cross the Potomac, quiet now both by day and by night, and reach the romance of the Old Dominion, its F. F. V.'s, its statesmen sedate and its warriors bold. One crosses into the Civil War daughter of Virginia, West Virginia, and touches its coal mines and the medical influence of Moore and Vest. One reaches Charlotte, the land of Monroe and Crowell, and senses the splendid work being done at Davidson and the University of the Old North State in training medical students. South Carolina and the medical names of Wilson and Weston appear, and we recognize the peppery protoplasm that started one war and will start another at the drop of the hat. The generosity of wisdom has been given to Vanderbilt and the Medical Department alone has eight million dollars, which will make it one of the great medical schools of the earth. So thrifty is Tennessee that a Hebrew meets financial difficulty in east Tennessee, and the State has given three Presidents to the Southern Medical Association. I hesitate to mention Kentucky again, but enough Louisville doctors to fill three Pullmans came to Hot Springs. The City of Louisville owns its own medical school and has sent its graduates from one end of the country to another. We feel proud of Kentucky.

There is some rivalry between South Carolina and Georgia—a rivalry of politics and heat and not of wealth or worth. These two states can become more heated about a political election and cool down sooner afterward than any other two states in the Union. Much the same state of affairs exists between the Ethiopians of both states as to whether Augusta or Charleston is the hotter. It was decided that it depends upon where you are. If you are in Augusta it is hotter than Charleston, and vice versa, only more so.

I should not pass Georgia without referring to the long time devotion of the Chairman of the Council, who hails from Savannah, where Oglethorpe had some trouble finding dry land and a roof. The first Secretary of the American Medical Association was from Savannah. We are proud of Savannah in many ways. There is some jealousy between Savannah and Atlanta. Savannah has a water front and Atlanta has none. One citizen remarked that if Atlanta could suck as hard as she blew she would have a water front by morning. The Chairman of the Council is a modest man and a man of vision. Some of the credit for his vision must be given to his environment. Omitting any consideration of his own beautiful city, he has the ocean on one side of him and the ways of a swamp on the other, and to see anything at all he must cultivate a long vision.

Florida is the hope of every Yankee and the home of Jackson, of Miami. Henson, of Jacksonville, and Helm, of Tampa, add to Florida's pride. In Appalachicola, a physician first discovered the method of making artificial ice—the boon of sickness, food and drink.

I want to come to Alabama, and in Alabama for a moment rest. I want to refer with no wavering words to the master builder of the Southern Medical Association. When the history of Alabama medicine shall be written they will devote a paragraph to his ability as a specialist and a scientific medical man. Another paragraph will be given to his work as head of the Division of Gastro-Enterology in the Surgeon-General's office during the World War and another paragraph to his great service as Editor of the medical bulletin, War Medicine, of the A. E. F. It will take a whole chapter to detail his unselfish devotion and power of organization as the master builder of this Association. He is that man of this generation who has done more to upbuild Southern medicine than any man among us, or any man who has ever lived in Southern medicine to this day.

Mississippi and Louisiana are side by side in the possession of Leathers and Dowling and that wonderful group from New Orleans. Cary and Texas added a thousand new members in a year. Texas is peculiarly big. Every man in Texas says Texas is larger than it really is and that every man outside does not know how big Texas really is. Oklahoma is shaped like a flag with a Red River border to the north of the Lone Star State, and some day we shall meet in Oklahoma City.

Four of us belonged to the thirteen original colonies—Virginia, North and South Carolina and Georgia. Of the four states west of the rather wandering Father of Waters, the northernmost is Missouri. Traditionally the Missourians are the descendents of Thomas, and of them it is said that they are a wicked and perverse generation seeking after a sign.

We are proud of the Southern Medical Association. To it for fifteen years has been given the full medical devotion of the pick of the medical profession of the South. We are particularly loyal to the American Medical Association and to our constituent and special societies. There

is a warmth of fellowship and a freedom of discussion in the Southern Medical Association that is untrammeled and unapproached. As this Association does and thinks and acts, so is Southern medicine. Here are gathered the very flower of Southern medicine. We shall continue to grow. Instead of six thousand members as we have today, we shall have ten and fifteen and twenty. We have one of the best medical journals in the country. Instead of issuing it monthly, it will later have to come out every two weeks; and after some of us are dead, every week. It is an inspiration to be here and a privation to miss one single meeting.

We are glad to be here in Arkansas; we thank you for your splendid welcome; and we are coming again.

REPORT OF THE COMMITTEE ON ARRANGEMENTS

Dr. W. T. Wootton, General Chairman of the Committee on Arrangements, made announcements about the various entertainments, dinners, the reception to the President, etc. He stated that all the bath houses extended invitations to the doctors and their families in attendance upon the meeting to avail themselves of the use of the Hot Springs baths complimentarily. He urged the doctors to test out the effect of the baths with clinical thermometers and blood pressure apparatus and then see if they could duplicate this effect at home. "If so, continue to tell your patients to go upstairs and get the same bath in the bath tub that they can get in Hot Springs, but convince yourselves of this fact before you leave."

"In homeopathic doses the water is really as good as a beverage, but if it should fail to quench your thirst, just press the button and we will attend to it."

Dr. Wootton then introduced Dr. Jere L. Crook, President of the Southern Medical Association, who delivered his President's Address, his subject being "The Aristocracy of Service."

Dr. W. H. Witt, Nashville, Tenn., delivered the Oration on Medicine, his subject being "The Patient Himself—the Need of a Better Study of His Personality and of the Varied Meaning of Symptoms."

Dr. J. Shelton Horsley, Richmond, Va., delivered the Oration on Surgery, his subject being "The Ideals of a Surgeon."

Dr. W. S. Leathers, State Health Officer of Mississippi, Jackson, Miss., delivered the Oration on Public Health, his subject being "Public Health Policy in the Medical Profession."

The first general session then adjourned.

ur.day, November 17, 2:00 p. m.—Second and Last General Session

The Association met in Room A, Eastman Hotel, and was called to order by the President, Dr. Jere L. Crook, who announced that the first order of business would be the Report of the Council.

REPORT OF THE COUNCIL

Dr. H. H. Martin, Savannah, Ga., Chairman of the Council, presented the following report for the Council:

To the Members of the Southern Medical Association:

An informal joint session of your Council and your Board of Trustees was held in the private dining room of Mooreland, Hot Springs, Ark., Monday, November 14, at 12:30 p. m. The purpose of this informal joint session was to discuss plans for the transfer of the ownership of the Southern Medical Journal to the Southern Medical Association in accordance with a contract which was read at the general session last year and which was made by the Trustees on instructions given them at the meeting of the Southern Medical Association in Hattiesburg, Miss., November, 1911. This matter was discussed in all of its phases and the Trustees were instructed to proceed at once to consummate this contract.

At this informal meeting our beloved Secretary-Editor, Dr. Seale Harris, tendered his resignation, and while your Council and your Board of Trustees were very much averse to accepting Dr. Harris' resignation, in recognition of his valuable services in the past and in response to his earnest request, there was no alternative but to accede to his request.

The joint meeting then adjourned and the Board of Trustees held a special informal meeting Monday at 8:00 p. m., and then their regular executive session Tuesday, November 15, at 12:30 p. m. Here follows the report of the Board of Trustees:

REPORT OF THE TRUSTEES

To the Council of the Southern Medical Association:

The Board of Trustees of the Southern Medical Association convened in informal session in the private dining room of Mooreland, Hot Springs, Ark., November 14, 1921, at 8:30 p. m. Present: Dr. Stuart McGuire, Chairman; Dr. Lewellys F. Barker, Dr. E. H. Cary, Dr. Robert Wilson, Jr., Dr. Oscar Dowling. Sitting with the Trustees: Dr. W. W. Crawford, Dr. J. M. Jackson, Dr. Seale Harris and Mr. C. P. Loranz.

The Chairman of the Board of Trustees announced that there were present five trustees out of a total of six, and declared the meeting duly constituted for business.

Mr. C. P. Loranz, Business Manager, presented his report on the business of the Journal and the Association for the past year, which was unanimously approved. He called attention to the fact that his report shows the average net income of the Journal to be $5,539.28 per year for the past three years. He also presented the auditor's report on the Journal's books for the three years ending October 31, 1921, and on the Association's books for seven years ending October 31, 1921. (See pages 78 and 79 for these reports in full.)

The following resolution was then offered and unanimously adopted:

In compliance with the terms of a contract entered into by the Trustees of the Southern Medical Association and the owners of the Southern Medical Journal November 15, 1911, the Trustees of the Association, for and in the name of the Association, do hereby purchase from the stockholders of the Southern Medical Journal Company their interest for the sum of fifty-five thousand dollars ($55,000.00) to be paid at once in notes of the Association dated November 15, 1921, and falling due for one-tenth of the amount each year for a period of ten years, said notes to bear no interest to maturity and to be paid out of the earnings of the Journal. The Chairman of the Board of Trustees is hereby authorized to close the transaction in legal form for the Board.

The purpose and intent of this resolution is that the Association, through its Board of Trustees, is to give to each individual stockholder of the Southern Medical Journal Company a note for the amount due him (or her) for his (or her) stock under the terms of this purchase and according to the provisions of the Charter of said Southern Medical Journal Company. It is also the purpose and intent of this resolution that the present owners of the Southern Medical Journal Company are to wind up their business and dissolve their Company, the Southern Medical Association taking over as at November 15, 1921, the established business known as the Southern Medical Journal, its name and good will, subscription list and advertising contracts—its actual earning ability on and after November 15, 1921.

The Trustees recommend the creation of a Publication Committee to be composed of three to have supervision over the conduct of the Journal with power to act, said Committee to be accountable to the Board of Trustees and to be appointed by them each year. The Board of Trustees recommended that the following compose the Publication Committee for the first year, viz: Dr. Seale Harris, Chairman, Dr. B. L. Wyman, and Dr. Oscar Dowling.

The Trustees recommend that life memberships in the Association be created which may be acquired by the payment of $100.00. The Association's notes which are to be given the stockholders of the Southern Medical Journal Company in lieu of their stock in the purchase of the Journal will be accepted in payment if desired.

The Trustees recommend that the dues of the Association be increased to $4.00 per year in order to provide additional revenue for improving the Journal and accumulating a surplus for acquiring our own home and plant.

After informal discussion the Trustees adjourned to meet in regular executive session Tuesday, November 15, at 12:30 p. m. On Tuesday at 12:30 p. m., in the private dining room of Mooreland, the Trustees met in regular and executive session. The following Trustees were present: Dr. Oscar Dowling, Vice-Chairman and Acting Chairman, Dr. Lewellys F. Barker, Dr. Robert Wilson, Jr., Dr. E. H. Cary and Dr. Duncan Eve, Sr. Sitting with the Trustees: Dr. W. W. Crawford, Dr. J. M. Jackson, Dr. Seale Harris and Mr. C. P. Loranz.

The Chairman of the Board of Trustees announced there were present five Trustees out of a total of six, and declared the meeting duly constituted for business.

The resolution and recommendations of the Trustees approved at the informal meeting the evening before were then read and again unanimously approved. After informal discussion the Trustees then formally adjourned.

The Board of Trustees, representing seventy-four (74) shares of preferred stock of the Southern Medical Journal Company, then went into executive session representing the stockholders of said Southern Medical Journal Company, and a stockholders' meeting of said Southern Medical Journal Company was then formally opened. Dr. Seale Harris, President of the Southern Medical Journal Company, called the meeting to order.

After an informal report on the condition of the Journal, its earnings, etc., during the past year, it was moved and carried that a Board of Directors consisting of Dr. Seale Harris, Dr. W. W. Crawford and Mr. C. P. Loranz be elected to carry on the Company's affairs.

In compliance with the terms of a contract entered into by the Trustees of the Southern Medical Association and the owners of the Southern Medical Journal November 15, 1911, the stockholders by unanimous vote ordered the Board of Directors to consummate the purchase of the Journal by the Association as per price and terms indicated in a resolution approved by the Board of Trustees of the Southern Medical Association this day, said Board of Directors of the Southern Medical Journal Company being impowered to proceed in a legal way to consummate the sale and close up the affairs of the Company.

The stockholders' meeting then adjourned.

(Signed) OSCAR DOWLING,
Vice-Chairman and Acting Chairman,
Board of Trustees, Southern Medical Association.

The Council met in regular session for its fifteenth annual meeting in the private dining room of Mooreland, Hot Springs, Ark., Tuesday, November 15, 1921, 12:30 p. m.

The following Councilors were present: Dr. H. H. Martin, Georgia, Chairman; Dr. W. S. Leathers, Mississippi; Dr. George Dock, Missouri; Dr. Jos. B. Greene, North Carolina. Dr. R. H. McGinnis, Florida; Dr. Ennion G. Williams, Virginia; Dr. J. A. Stucky, Kentucky; Dr. O. M. Marchman, Texas; Dr. William Litterer, Tennessee; Dr. W. R. Bathurst, Arkansas; Dr. T. W. Moore, West Virginia; Dr. A. W. Ralls, Alabama, and Dr. Millington Smith, Oklahoma. Sitting with the Council: Dr. Jere L. Crook, President.

The first order of business was the naming of a Committee on Awards for Scientific Exhibits. The Committee was constituted as follows: Dr. Bryce W. Fontaine, Chairman, Dr. John R. Caulk and Dr. Holman Taylor.

The next order of business was the consideration of a communication from Dr. W. A. Mulherin suggesting certain changes in our present plan of carrying out the scientific program at our annual meetings. Dr. Mulherin's plan is embodied in the following resolutions:

Whereas, The purpose of the Southern Medical Association is to develop and foster scientific medicine and medical fraternalism, and naturally includes in its purpose of organization the best ways and means for its fulfillment; and,

Whereas, The steady growth of the Southern Medical Association, now numbering about 6,000 members, demands that any method of procedure in carrying out the Association's scientific program be made adaptable to and dependent on the present and future growth of our Association, whereby the greatest good will come to the largest number; and,

Whereas, It is believed the half day session plan for the various sections of the Southern Medical Association—as adopted and practiced by the American Medical Association for the past two years—will better develop and foster scientific medicine and medical fraternalism in our Association than our present plan of procedure; and,

Whereas, The advantages to be derived from the half day session plan are: (1) A larger attendance at each section meeting, with the result of wider dissemination of essential medical knowledge. Also, as a result of intermingling of members from the different sections, there would be fostered a better and broader acquaintanceship, and a more genuine and general fraternalism. (2) The general practitioners, constituting the largest number of our membership, would be more logically and fairly treated. They could make a better and more pleasing selection of papers desired to be heard read and discussed, and would return home better satisfied and better informed physicians. (3) It is pretty well recognized in medicine today that the trend of specialties is drifting in the wrong direction. The special line of workers in medicine are tending to become narrow-gauged and circumscribed in their ideas, and too intensive in their work. A broader vision of medicine, obtained by members of our Association mixing up with the different sections, is becoming more imperative, if we wish to develop well-rounded, well-balanced special medical workers in our various fields of medicine. (4) Due to the intensive grinding in each section, going on with the S. M. A.'s present arrangement, the majority of our members return home from the meetings tired out both mentally and physically. The half day sessions will permit more relaxation, and at the same time return us more profit for the time and money spent at our Association meetings; and,

Whereas, From extensive correspondence and conversations with the officers and members of the Southern Medical Association, it has been learned that the general sentiment prevailing in our Association is almost unanimously in favor of the adoption of the half day session meetings, therefore,

Be it resolved, That the Council of the Southern Medical Association do temporarily adopt on trial, for the next three years, the half day session meetings as the regular order of procedure in carrying out the scientific program of the Southern Medical Association.

And be it further resolved, If, at the expiration of three years' trial, the half day session plan meets with the approval of the members of this Association, it be then finally adopted as the permanent order of procedure in conducting our future scientific programs.

The Council ruled that no action should be taken on so vital a matter without knowing the wishes of the various sections. The matter was laid on the table for one day in order that an expression of approval or disapproval might be secured from the various sections.

After much informal discussion the Council adjourned until Wednesday, November 16, 12:30 p. m.

The second session of the fifteenth annual meeting of the Council convened in the private dining room of Mooreland November 16, 12:30 p. m. Present: Dr. H. H. Martin, Georgia, Chairman; Dr. R. H. McGinnis, Florida. Dr. Wm. R. Bathurst, Arkansas; Dr. A. W. Ralls, Alabama; Dr. Jos. B. Greene, North Carolina; Dr. W. S. Leathers, Mississippi; Dr. Ennion G. Williams, Virginia; Dr. William Litterer, Tennessee; Dr. George Dock, Missouri; Dr. Oscar M. Marchman, Texas. Dr. James A. Hayne, South Carolina, and Dr. W. E. Vest, West Virginia, represented their respective states at this Council meeting by appointment of the President. Sitting with the Council: Dr. Jere L. Crook, President; Dr. Seale Harris, Secretary-Editor; and Mr. C. P. Loranz, Business Manager.

The Council had the pleasure of having a short address from Colonel Clarence J. Owens concerning the proposed Gorgas Memorial Institute and asked the approval of the Southern Medical Association of this memorial. The following resolution was then presented and approved:

Whereas, The Hon. Clarence J. Owens, Director-General of the Southern Commercial Congress, ap-

peared before the members of our body on Tuesday evening, November 15, and, speaking in behalf of the Gorgas Memorial Institute, presented to our members the plan and purposes of the organization; and,

Whereas, The life and achievements of the late General William C. Gorgas have been an inspiration to thousands of our members to greater service for humanity, not only because of his distinguished contributions to our knowledge of tropical diseases, their prevention and treatment, but also because of his kindly regard and interest in their work, particularly noted during his service as Surgeon-General of the United States Army during the period of the great World War; and,

Whereas, It has been shown to our body that the plans and purposes of the Gorgas Memorial Institute contemplate the establishment in the Republic of Panama of a great laboratory and research institution for the further study and prevention of tropical diseases, and the preparation and maintenance of expeditions going to the uttermost corners of the world, if need be, to study the varying forms of tropical diseases—this institution to be housed in a magnificent home to be built and equipped by the Republic of Panama and sustained by the income from a foundation of at least five millions of dollars, contributed by the peoples and states of the American continents;

Therefore, be it resolved in consideration of these facts that the Southern Medical Association, at its official business meeting, held in Hot Springs, Ark., on Thursday, November 17, 1921, does hereby officially signify its complete and most cordial endorsement of this plan to memorialize the late General William C. Gorgas in the manner contemplated by the Gorgas Memorial Institute, not only because it will constitute a worthy recognition of the character and achievements of the great man whom our members all love and will serve as a splendid and most necessary means of combating the spread of tropical disease throughout the world, but also because the memorial will be in effect a memorial to the efficiency and tremendous importance of medical science in any work of great world significance, and we hereby approve the appointment of a committee of five of our members by the President of our Association, and to be officially notified of their appointments by the Secretary of our Association, this committee to be delegated to confer with the officers and other authorized representatives of the Gorgas Memorial Institute and like committees appointed by other associations equally interested in the Gorgas Memorial Institute, and to act, to the end that the Southern Medical Association and its component membership may join in furthering the establishment of the Gorgas Memorial Institute and its five million dollar supporting foundation by making it the object of their especial attention during the coming year and assisting in any and all ways possible.

Dr. Seale Harris then presented the following resolution, which was approved:

Resolved, That the Southern Medical Association heartily endorses the proposed Gorgas School of Sanitation to be located at Tuscaloosa, Ala., in connection with the University of Alabama; and that a committee of five be appointed by the President of the Association to aid in every way possible to carry out the plans of the Committee of the Gorgas School of Sanitation at the University of Alabama.

The Council then took up for further consideration the proposed change of order for the scientific program at our annual meeting as outlined in the communication and resolutions of Dr. Mulherin. The Council, learning that a resolution similar to the one presented to the Council having been unanimously passed by the various sections, approved the plan, instructing the Secretary of the Association and the chairmen of the sections to work out the details.

The Council, by unanimous action, made all of the one-day sections, the sections meeting on Monday for one day and which are known as the preconvention sections, full sections, the Secretary of the Association being authorized to regulate the amount of time for these sections and the number of papers to be allotted them. This action was taken in order that the programs of these sections should come under the new half day session plan just adopted.

The report of the Board of Trustees, which appears above, was then read and taken up in detail. This report, with its resolutions and recommendations, was approved, with the exception of the recommendation increasing the annual dues to $4.00 per year. The Council is still of the opinion expressed to you at the last annual meeting: that a surplus is undesirable in an organization of this kind and so long as our income can be made to meet our expenditures an increase in dues would be inadvisable. And the Council is of the opinion that general conditions at this time are such as not to justify an increase in the annual dues.

The Council wishes to emphasize the importance of the scientific exhibits and to request more of these exhibits to our annual meeting. It was moved and carried that those planning to have exhibits at the meeting notify the Association office some weeks in advance of the meeting of the exact amount of space they will want so that this space can be provided.

The Council recommends to the Association that the dues of the secretaries of the state medical associations within the jurisdiction of this Association be remitted each year—these state secretaries to have the privilege of Association membership without the payment of usual annual dues.

The Council then proceeded to the election of three members to the Board of Trustees to succeed Dr. Stuart McGuire, Dr. Oscar Dowling and Dr. Robert Wilson, whose terms expire this year. As had been the Council's custom in the past, the older member in point of service, Dr. Stuart McGuire, was retired and Dr. Jere L. Crook, our retiring President, was elected to fill this vacancy, Dr. Wilson and Dr. Dowling being re-elected.

The Council then took up the question of the meeting place for the next annual session. Invitations were received from Atlanta, Chattanooga, Richmond, St. Louis and Jacksonville. Also an invitation from Alexandria, La., for the Association to meet in that city in 1923. After careful consideration Chattanooga was selected for the 1922 meeting place.

The President, Dr. Jere L. Crook, then asked the Council to approve the action of himself and the Secretary, Dr. Seale Harris, in sending the following telegram to ex-President Woodrow Wilson:

The Southern Medical Association, through its President and Secretary, wishes you to know that you have the love of its members, who rejoice that you were able to take part in the Armistice Day ceremonies. We are in full sympathy with your lofty ideals of humanitarian service, and we pray God's blessings on you and your noble wife. It may be of interest to you to know that the mention of your name has several times brought this convention to its feet in enthusiastic applause.

The Council approved this action and thanked Dr. Crook and Dr. Harris for their thoughtfulness in performing this very commendable act.

The President, Dr. Jere L. Crook, then read to the Council the following telegram received from ex-President Wilson in reply to the telegram just approved: "Please convey to the members of the Southern Medical Association my most grateful thanks for their generous and cheering message."

On motion of Dr. Vest, the Council rose and remained standing for a moment as a tribute and expression of our appreciation for the services rendered us during the past eventful years by our retiring Secretary-Editor, Dr. Seale Harris.

In closing this report the Council takes great pleasure in announcing that the medal for achievement in medical research has been awarded by the special committee to Dr. Kenneth M. Lynch, of Dallas, Tex., for his original and meritorious investigation in the parasitology of tropical diseases.

The Council then adjourned its business session and reconvened as the official nominating committee. The Council's nominations will be presented to you in the regular order of business following your action on this report.

Before submitting this report for your consideration I desire to read a resolution handed to me this morning too late for the Council to take official action, but of such vital importance that I present it for your action and urge its adoption:

Whereas, Unmistakable proofs show that Crawford W. Long used sulphuric ether to produce surgical anesthesia in Jefferson, Ga., on March 30, 1842; and,

Whereas, Undoubted records show that this was the first time in history that ether was ever used for this purpose; and,

Whereas, We are convinced that Dr. Long did everything in his power, with the facilities at hand, to publish his discovery to the world; be it

Resolved, That the Surgical Section of the Southern Medical Association, in session at Hot Springs, Ark., November 16, 1921, declares that Crawford W. Long, and none other, was the discoverer of anesthesia, and is entitled to the credit and honor for an achievement

of such inestimable benefit to medicine and to humanity.

Be it resolved further, That the Southern Medical Association in general session is requested to adopt a resolution similar to this one; and that a committee consisting of one member from each state represented in the Southern Medical Association be appointed by the President of the Association to investigate the merits of all claimants to the honor of being the discoverer of anesthesia, giving the matter proper and careful attention, and report at our next annual meeting.

(Signed) H. H. MARTIN,
Chairman of Council.

Dr. Crook, the President, then said:

You have heard the report of the Chairman of the Council. In this report there is incorporated a very radical change or advanced step, as the members of the Council think. Ten years ago a resolution was passed that at the end of ten years the Association would have the privilege of buying the Southern Medical Journal. The Board of Trustees has worked out the details of the transfer in a legal way and has submitted its report, and it has been unanimously approved by the Council. We are to pay for the Southern Medical Journal in ten annual installments of $5,500.00 each; in other words, a total of $55,000.00 in ten annual installments, without interest.

Dr. James M. Jackson, Miami, Fla., moved that the report of the Council be accepted and adopted as presented. Seconded and carried unanimously.

Dr. Crook, the President, commented further as follows:

The question of raising the dues of the Association was brought up, and our Secretary-Manager, Mr. Loranz, with a fine sense of appreciation for the good of the Association, was the chief objector to raising the dues. This is rather unusual for one who has the financial management of the Association. Mr. Loranz is very anxious that we should have a larger membership, and believes we are more likely at this time to get it at the $3.00 rate than if we were to increase the dues to $4.00. Consequently the dues will remain at $3.00 as formerly.

Dr. M. L. Graves, Galveston, Tex., was then recognized and said:

I wish to move the adoption of the resolution regarding Dr. Crawford W. Long, presented by the Section on Surgery and which has just been read, and in doing so I wish to say that some years ago I was interested in this question, because quite an important book was published in America called "Epoch-Making Discoveries in Medicine and Surgery." Among others a chapter was devoted to anesthesia, and in that whole chapter no mention was made of Dr. Crawford W. Long and his experiments in Georgia, which were made prior to anything discovered by Morton and Wells in Boston. Upon inquiry I was informed that this was due to the fact that Dr. Long had never published his researches, and so the author of the book would not have deliberately ignored this priority had he been aware of Dr. Long's work.

Dr. Allen J. Smith published an exhaustive investigation of the subject some years ago, in which he established the fact that Dr. Long was the first man who ever used ether as an anesthetic in surgery. So I feel that it is highly important and proper for us in the Southern Medical Association to establish in this historical way the credit of Dr. Long for that achievement.

The motion was seconded and carried unanimously.

REPORT OF THE COMMITTEE ON SCIENTIFIC AWARDS

The Report of the Committee on Scientific Awards was read by the President, who announced that unless there were objections the report would stand approved as read:

To the Southern Medical Association:

We, your Committee on Scientific Awards appointed by the Council, visited the Scientific Exhibits and went over them very carefully. We understand that we are to make two awards, one for the best exhibit by an individual physician and one for the best public health exhibit.

For the best exhibit by an individual physician we make the award to Dr. William Keiller, of the Department of Anatomy, University of Texas, Galveston, for his exhibit of charts, drawings and pathological specimens of a case of syringomyelia. The Committee compliments Dr. Keiller on this most excellent piece of original work.

For the best public health exhibit the award is to the Mississippi State Board of Health, Dr. W. S. Leathers, State Health Officer. The Mississippi State Board of Health is to be greatly congratulated upon its exhibit and the splendid public health work it reflects.

The Committee commends the splendid Malaria Exhibit assembled through the National Malaria Committee. This shows the very effective work that has been done in malaria control throughout the South and your Committee can not praise too highly the National Malaria Committee for assembling this exhibit.

The Committee desires to make special mention of the following exhibits by individual physicians: Dr. Ernest Sachs, Neurological Clinic of Barnes Hospital, St. Louis, Mo.; Drs. Martin and Martin, Dallas, Tex., and Dr. Loyd Thompson, Hot Springs, Ark.

The Committee found all the scientific exhibits interesting and well arranged. It wishes to urge that this feature of our annual meetings be encouraged more and more each year. These scientific exhibits have a great educational value and add much to the interest and attractiveness of our meetings.

(Signed) BRYCE W. FONTAINE, Chairman
JOHN R. CAULK,
HOLMAN TAYLOR, Committee.

Dr. Crook, the President, called Dr. Kenneth M. Lynch, Dallas, Tex., to the platform, and commented thus:

You have been delving in the laboratory. Your work has been inconspicuous, but you have developed matters of supreme importance to humanity, and the Southern Medical Association, in line with its custom of honoring those who have distinguished themselves, gives a medal to the men who are worthy of it. It becomes my pleasant duty, on behalf of the Association, to hand you this gold medal with your name inscribed on it as a testimonial of the splendid work you have done in the parasitology of intestinal diseases and tropical medicine.

Dr. Lynch then accepted the medal.

Dr. Frank K. Boland, Atlanta, Ga., was recognized and commented thus:

I would like to say for the benefit of our Northern guests who are visiting here at this time that if they have never witnessed it before, they have never had a better chance in their lives to enjoy old-fashioned hospitality than we have had here. As soon as we crossed the Mississippi River we began to feel better, and when Dr. Drennen met us on the train we felt, as far as the South was concerned, that westward the star of hospitality had taken its sway.

Dr. Boland then introduced the following resolutions, which were unanimously adopted:

Whereas, The present meeting of the Association has been one of the most successful and delightful in its history;

Be it resolved, That the sincere appreciation and thanks of the Association be expressed to the Garland County-Hot Springs Medical Society, Dr. Wm. H. Deaderick, President;

To the local Committee on Arrangements, Dr. W. H Wootton, Chairman;

To Mr. Walter Hebert, of the Business Men's League, for the splendid publicity he has given the sessions;

To the Missouri Pacific Railway and to the Rock Island Railway, especially for the "President's Special," furnished by the Missouri Pacific;

To the Associated Press and the press of Hot Springs;

To the Eastman, Arlington, Mooreland and other hotels;

To the Elks Club, Baptist Church, Knights of Pythias, and to the Woodmen of the World for the use of their halls;

To the civic organizations and to the citizens of Hot Springs, especially for the beautiful decorations which greeted us everywhere;

And above all, to the Ladies' Entertainment Committee, Mrs. W. H. Wootton, Chairman, whose untiring efforts have added so much to our pleasure.

We have never known such cordial, spontaneous hospitality.

We have been to Arkansas, and we like it.

Every member of the Association will leave Hot Springs with the kindest of feelings for its people, and with the highest praise for its wonderful waters.

REPORT OF NOMINATING COMMITTEE

Dr. H. H. Martin, Chairman of the Council, read the report of the Nominating Committee.

The Council, as your official Nominating Committee, present for your consideration the following:

For President, Dr. Seale Harris, Birmingham, Ala.

For First Vice-President, Dr. W. A. Mulherin, Augusta, Ga.

For Second Vice-President, Dr. W. T. Wootton, Hot Springs, Ark.

For Secretary-Treasurer and Business Manager, Mr. C. P. Loranz, Birmingham, Ala. Mr. Loranz to be elected for a period of five years and carry the title of Secretary-Manager.

For Editor of the Journal for one year, Dr. M. Y. Dabney, Birmingham, Ala.

The President called for further nominations. Dr. Oscar Dowling, New Orleans, La., moved that the nominations be closed and that the nominees presented by the Council be unanimously elected. Motion seconded and carried unanimously.

Dr. Crook, the President:

Our Association has elected for its President a man who, by his loyalty and devotion, unanimously deserves everything we can give him—Dr. Seale Harris.

Dr. Harris was escorted to the platform and said:

In accepting this honor, which is the greatest that can come into the life of a physician who lives in the South, I am somewhat in the position of the widow who on one occasion was on board a Long Island train. She was silently weeping, and dressed in all the habiliments of woe. Beside her was an old maid, a very sympathetic spinster, who said to the weeping widow: "My good woman, why do you weep?" And the widow replied: "Alas, alas! There is nothing that can give me surcease from my sorrow. I am on my way to the crematory with the remains of my dear dead third husband." Then the old maid sighed and said, "Alas, alas! The good things of this world are not evenly distributed. Here I am, fifty years old, and have never been able to get one husband, while this woman has husbands to burn."

The Southern Medical Association has given me very much greater honor than I deserve when there are so many men in it that deserve this honor far more than I do. When I say the Southern Medical Association has done a great deal more for me than I have for it, I mean that the greatest pleasure in my life, the greatest joy that has come to me next to the devotion of my family, is the fact that I can meet you here, shake your hands, look into your eyes, and from your kind words realize that the physicians of the South approve of my work.

The Association has done much for me in many ways and I do not deserve any credit for much I have done. Illustrating this, I wish to mention the fact that General Gorgas was one of our most devoted members. While he did not attend all of our meetings, his heart was always with us. On the occasion of the Richmond meeting he was entertained by Dr. Stuart McGuire. He visited the various section meetings that were going on. He felt the spirit of geniality that was present everywhere, and he said that the Richmond meeting was the most nearly perfect medical meeting he had ever attended. When the World War came on and General Gorgas wanted some one to serve on his staff, he called into his office the Secretary of this Association. No physician could have a greater privilege in the world than that of being close to General Gorgas during those trying times. I owe that privilege to being the executive officer of the Southern Medical Association.

Another fortunate incident in my work as Secretary of the Southern Medical Association that I might mention to you is that on the occasion of the Dallas meeting of the Association, Surgeon-General Ireland was present. At that time he was a Colonel in the United States Army and was stationed at San Antonio. He came to the meeting and was entertained by Dr. Cary and other Dallas physicians. He witnessed the work of the scientific sections. He listened to the papers and discussions. Later, when General Ireland was Chief Surgeon of the American Expeditionary Forces in France, in organizing a medical society, as well as the research committee of the American Expeditionary Forces, he needed some one to take charge and be secretary of the medical society, and to be editor of War Medicine and Chief of the Bureau of Publication of the American Red Cross. He cabled General Gorgas to send the Secretary of the Southern Medical Association over to France and to attend to that work. So you see I owe to this Association quite directly the privilege of serving in France.

Many of you have been good enough to say kind things to me and about my work as Secretary of the Association and as Editor of the Journal. I wish to say to you in all seriousness that you have given me credit for much that I do not deserve. The real truth of the matter is this: The work of the Association at its headquarters has been carried on by the Association and Journal staff, and the one who has done most of that work for the Southern Medical Association has been the Business Manager of the Association, Mr. Loranz. Mr. Loranz has worked from twelve to fifteen hours a day and has dreamed about the Southern Medical Association at night. There has never been a man engaged in any work who has been more devoted to it or who has rendered more efficient service in any capacity than he has for the Southern Medical Association. I wish to give him the credit that he really deserves for this work.

I would like also to give due credit to another member of the Journal staff who has been termed "the angel of the Association," Miss Della Purifoy. Through the results of Miss Purifoy's personal efforts she has obtained a great many more members for the Southern Medical Association than I have, and it is the influence of a good woman that has done much in the upbuilding of the Southern Medical Association. Last year we had the fright of our lives at the Association's headquarters. Miss Purifoy married a splendid young man and we were afraid we were going to lose her. But she could not forget her first love, and she leaves her delightful home every morning to come down and work for the Journal all day and goes home with her husband in the evening.

Other members of the Association staff also deserve great credit for what the Association has accomplished. Five years ago we were fortunate in securing the services of Dr. Dabney as Associate Editor of the Journal. About a year afterward I left the Journal office to take up my duties in the Army, and Dr. Dabney, on account of a physical disability, was forced to remain in Birmingham for more than two years, during which time he was in charge of the editorial work of the Southern Medical Journal. Also, during this war period as Associate Editor, Dr. James R. Garber, of Birmingham, rendered valuable service which it is my great pleasure to acknowledge on this occasion. You gentlemen remember that the Journal was ably edited during the war when for two years I did not even make a suggestion as to its management. I want you to realize what Dr. Dabney has done for the Association. He is a very retiring man, and I would like for you to actually know him. He is one of the most accomplished men in medicine in the South or anywhere else in this country. He is an alumnus of the University of Virginia and of the University of Chicago. He received his medical education at the Johns Hopkins. There is not a man in the South better fitted to carry on the duties of Editor of the Southern Medical Journal than Dr. Dabney.

Gentlemen, in carrying on this work there have been those who have suffered, and I think it is only right that Mrs. Harris and Mrs. Loranz should receive some recognition for the sacrifices that they have made for this Association. Many an evening, when I ought to have been with my wife and helping her to make life agreeable, I have been writing editorials for the Southern Medical Journal. In the afternoons, after my office hours, Mr. Loranz would come to my office and present his ideas to me regarding the Southern Medical Association and we would discuss the affairs of the Association and Journal while our wives and families would be waiting for us to come home to supper.

We have received a great deal of credit for things that have gone on; but the great things of the Association have been done by those who organized this Association and who have directed its work. The physicians of the South can never appreciate because they do not know of the splendid work and devotion that Dr. H. H. Martin, Chairman of the Council, has given the Southern Medical Association. I myself was not one of the founders of the Association: I was not present at the first meeting, but Dr. Martin, Dr. Jere Crook, and the others who were there organized the Association at a meeting of the Tri-State Medical Society at Chattanooga. Dr. Crook, Dr. Martin and Dr. W. W. Crawford, of Hattiesburg, sat up all night, I am told, and wrote the Constitution and By-Laws of the Association; and they have not been modified to this day. They have always been devoted to the Association. Some one

mentioned to me at this meeting that he heard that Dr. Martin was a kind of dictator. If there ever was a man who was less of a dictator in any way, it has been Dr. Martin. If you could be at some of the Council meetings, or look over the names of the members of the Council, you would realize that those gentlemen think for themselves. Throughout the years that I have worked with Dr. Martin, I can say to you that he has never had a selfish thought. He has never done one thing to advance his own interests. Until the last few years he paid his expenses in order to work for the Association, and he has never attempted in any way to do anything for his friends. On the other hand, he has always stood for everything that was considered to the best interests of the Association.

This Association is going to grow in its usefulness, and when the history of it is written your children and my children will be proud to know that we took part in its upbuilding, since it is doing so much for the advancement of scientific medicine and surgery and promoting public health in the South.

Dr. Harris requested Drs. Graves and Thompson to escort Dr. Mulherin, the First Vice-President, to the platform. He spoke thus:

Dr. Mulherin, as you know, is from Augusta, Ga. He has been one of the most devoted members of the Southern Medical Association, and largely through his efforts there has been built up in this Association the best Section on Diseases of Children in the world. In addition to that, he has been instrumental in bringing about some changes in the Association that have been most helpful. I refer particularly to the question of changes in our meetings so that we can better correlate the scientific work. Dr. Mulherin has had most to do with that, and the Council feels that he not only deserves the position of First Vice-President of the Association, but that he is excellent presidential timber, and if anything should happen to the President in any way, Dr. Mulherin would be a man who could grace the chair of the Association.

Dr. Mulherin, after having been escorted to the platform and asked to make a speech, replied:

I am not prepared to give you a speech or a talk at this time, and I am sure you will be glad of it. However, I can not help expressing my deep appreciation of the honor you have conferred upon me in making me your First Vice-President. I am especially thankful that you have given me this honor this year, so that I may serve under the very able and lovable President you have elected, Seale Harris.

I know of nothing the Councilors could have done this year that would have met with more universal and spontaneous approval than their selection of Dr. Seale Harris as President. I think we all, when we think of the Southern Medical Association, naturally think of Dr. Seale Harris. I merely wish to thank you very sincerely.

Dr. Harris requested Drs. Williams and Deaderick to escort Dr. Wootton, the Second Vice-President, and Mrs. Wootton to the platform. He continued:

As Secretary of the Association it has been one of my great privileges to attend the meetings of the Council and of course the meetings of the Association. Every year at the Association meeting, since Arkansas physicians have been eligible to membership, Dr. Wootton and a number of other Hot Springs physicians have invited the Association to hold its meeting in Hot Springs. We did not realize then what a delightful place Hot Springs was. We did not know that they have such ample hotel facilities, and some of the members of the Council were afraid that Hot Springs could not care for the Association. But last year when Dr. Wootton told us of this wonderful hotel (The Eastman) we were convinced, and so we are here and have enjoyed this meeting both socially and scientifically. The Local Medical Society made Dr. Wootton Chairman of the Committee of Arrangements, and it appointed the Committee on Entertainment.

Before Dr. Wootton makes his speech I am going to say this: While all the Hot Springs ladies have shown wonderful and delightful attention to the visiting ladies, never have they had greater attention paid to them than they have received here, the credit for which must be given to Mrs. Wootton and to the other ladies of Hot Springs.

There were calls for Mrs. Harris, and she was escorted to the platform.

President Harris then asked Dr. Wootton to say a few words. Dr. Wootton said:

I know you feel comfortable over the fact that Dr. Harris and Dr. Mulherin are enjoying good health and there is very little likelihood of either one of them passing on. I appreciate the fact that this is a composite honor and it is equally distributed, for every man in Hot Springs has endeavored to give you what little entertainment and comfort you have received. I feel we have done something for you, but we have not done all we would like to do for you. We would like to have interfered with the meetings of the sections, if possible, to have enjoyed your company, as we are very selfish, because we love you all.

President Harris: "I am going to ask Dr. Drennen and Dr. Dowling to bring Dr. Dabney to the platform. In addition to what I have already said about Dr. Dabney, I wish to say that I am delighted that he has been made Editor of the SOUTHERN MEDICAL JOURNAL."

Dr. Dabney replied:

Mr. President, Ladies and Gentlemen: Nothing particularly appropriate occurs to me at this moment. I was informed yesterday about the honor you have seen fit to confer upon me. So though it is not a surprise today, it is a great pleasure to receive the appointment. I realize that it is not altogether an honor. I believe it is a responsibility that you have placed upon me which will require the best that I can give you. That best I promise you.

I am sure it has always been a great privilege and an inspiration for me to be associated with Dr. Harris in the editorial work of the Journal.

Dr. Harris has, by his devotion, done more for Southern medicine than any other single man. If there is anything that you find in me in a journalistic way that makes you feel that I am worthy of the honor you are conferring upon me, remember that it was inspired and developed by Dr. Harris.

President Harris: "I have said something before about the newly elected Secretary-Manager, and I am going to ask Dr. Crook to bring Mr. Loranz to the platform."

President Harris, in addressing him, said:

Mr. Loranz is probably worn out from his efforts in the past six weeks or two months in preparing for this meeting. You do not realize the vast amount of work that is done in his office in Birmingham. There have been sent out in the last six weeks over 86,000 pieces of mail regarding the Hot Springs meeting. That is only one of the things that Mr. Loranz has done, and he has scarcely slept since he has been here. Gentleman, I present to you Mr. Loranz.

Mr. Loranz said:

Gentlemen, I appreciate the words of my chief with whom I have worked and served during the past nine years. I appreciate the confidence you have shown in me not only officially but by the many kind words that have come to me during this meeting from the various members. As your hired man, I shall give you during the next year the best that is in me.

Dr. Wootton made an announcement regarding the neurosyphilis clinic to be given immediately after the adjournment of this business session.

NEUROSYPHILIS CLINIC

At the close of the general session Dr. Sidney I. Schwab, St. Louis, Mo., read a paper on "Syphilis," in which he discussed the subject under the following heads: (1) Syphilis as a Neurological Problem; (2) Reaction of the Nervous System to the Organism of Syphilis; (3) Types of Clinical Expression; (4) Diagnostic and Therapeutic Problems, all of which was discussed by Drs. M. L. Graves, Galveston, Tex.; Loyd Thompson, Hot Springs, Ark.; Tom A. Williams, Washington, D. C.; William G. Somerville, Memphis, Tenn.; Otto Loewy, Newark, N. J.; George M. Eckel, Hot Springs, Ark.; George L. Echols, Milledgeville, Ga.; James T. Terrell, Dallas, Tex.; James H. Randolph, Jacksonville, Fla., and A. U. Williams, Hot Springs, Ark.

The Association then adjourned to meet in Chattanooga, Tenn., November 13-16, 1922.

Report of the Business Manager

To the Southern Medical Association:

I hand you herewith my report of the business of the Southern Medical Association for the fiscal year just closed (October 31, 1921).

During the year just closed we have received 1,028 new members and lost during the same period from resignations, deaths, failure to pay dues, etc., a total of 585, making a net gain in membership for the year of 443. Last year we reported a total membership of 5,795. Add to this our net gain this year of 443 and you will note that our present membership is 6,238.

It will be noted from my report that for the year just passed we are able to report a net surplus for the year of $351.98, this amount over our expenses. Last year there was a net surplus of $504.98, which, added to our net surplus of $351.98 for this year, makes a total net surplus at the close of this year of $856.96. This is the fourth time in the history of the Association that there has not been an annual deficit.

I give you a detailed statement of receipts and disbursements as shown by the books of the Association, following it with a statement of assets and liabilities at the close of this fiscal year.

There is also a comparative statement of the expenses and revenue for the past six years; a profit and loss statement for the past ten years, and a comparative statement of membership by states for the past ten years.

I give you also a balance sheet of the Southern Medical Journal Company for the fiscal year just closed (October 31, 1921). This balance sheet reflects the complete operation of the Journal for this past year. You will note a statement showing the average net profit of the Journal for the three years ending October 31, 1921, to have been $5,539.28 per year.

(Signed) C. P. LORANZ,
Business Manager.

RECEIPTS AND DISBURSEMENTS

Statement of Receipts and Disbursements as Shown by the Books of the Southern Medical Association, November 1, 1920, to October 31, 1921.

Receipts		
Cash on hand Nov. 1, 1920	$ 504.98	
Dues	19,209.50	
Exhibit Funds (Louisville meeting)	4,820.00	$24,534.48
Disbursements		
Southern Medical Jour. (Subscriptions)	$12,206.86	
Salary—C. P. Loranz, Bus. Mgr.	600.00	
Salary—Office Assistants	2,129.00	
Postage	1,372.50	
Stationery and Printing	3,198.53	
Traveling Expense	432.45	
Telegraph and Telephone	291.34	
Expenses at Louisville	3,065.05	
Office Rent	270.00	
General Expense	111.85	
	$23,677.52	
Cash on hand Oct. 31, 1921	856.96	$24,534.48

STATEMENT OF ASSETS AND LIABILITIES OCTOBER 31, 1921

Assets	
Cash on hand—Surplus (Profit and Loss Balance)	$856.96
Liabilities	
None.	

PROFIT AND LOSS STATEMENT, SOUTHERN MEDICAL ASSOCIATION

Deficit 1912	$ 71.97
Deficit 1913	1,544.48
Deficit 1914	1,952.37
Deficit 1915	1,382.55
	$4,951.37
Less cash November, 1911	61.71
Total deficit October 31, 1915	$4,889.66
Paid by Dr. Seale Harris, May 29, 1916, as per Dallas (1915) agreement (total amount of Journal stock sold and paid for at that date)	3,100.00
	$1,789.66
Deficit 1916	415.11
Total deficit October 31, 1916	$2,204.77
Paid by Dr. Seale Harris, Dec. 15, 1917, as per Dallas (1915) and Atlanta (1916) agreements	2,204.77
Surplus 1917	$ 171.08
Deficit 1918	407.53
Total Deficit 1918	$ 236.45
Surplus 1919	639.46
Total Surplus 1919	$ 403.01
Surplus 1920	101.97
Total Surplus 1920	$ 504.98
Surplus 1921	351.98
Total Surplus 1921	$ 856.96

BALANCE SHEET JOURNAL COMPANY

Balance Sheet, Southern Medical Journal Company, Fiscal Year Ending October 31, 1921

Good will		$25,218.48	
Capital Stock			$25,000.00
Surplus			13,108.23
Profit and Loss			88.57
Furniture and Fixtures		2,191.65	
Depreciation			1,111.90
Notes Payable (notes we owe)			None
Notes Receivable (notes due us)		44.89	
Advertising Account	$19,327.03		
Subscription Account	13,116.55		
Reprints Accounts	184.49		
Interest and Discount	88.25		32,716.32
Publishing Account	$14,907.08		
Cuts and Electros	493.46		
Second Class Postage	1,285.00		
Office Postage	125.40		
Stationery and Office Sup.	424.22		
Telegraph and Telephone	171.76		
Salary	6,039.70		
Association Stenographers	1,088.00		
Advertising Commissions	668.83		
Subscription Commissions	7.25		
Advertising Expense	60.00		
General Expense	372.45		
Rent	420.00		
Traveling Expense	344.60		
Journal Wrappers	184.35		
Press Clippings	60.00		
Taxes	629.55		
Medical Jr. Sub. Acc't	31.00		
Collection Fees Acc't	19.13	27,331.78	
Liberty Bonds Acc't		3,996.45	
Paper Stock Acc't		356.20	
Accounts Payable (we owe)			1,451.63
Accounts Receivable (owe us)		12,275.94	
Cash		2,061.26	
		$73,476.65	$73,476.65

Total Revenue Accounts		$32,716.32
Total Expense Accounts		27,331.78
Gross Profit		$ 5,384.54
Profit and Loss Acc't		88.57
Net Profit for year		$ 5,473.11

STATEMENT OF NET PROFITS FOR THREE YEARS

Net Profit year ending Oct. 31, 1919	$5,658.15
Net Profit year ending Oct. 31, 1920	5,486.58
Net Profit year ending Oct. 31, 1921	5,473.11
Total Net Profit three years	$16,617.84
Average yearly net profit	5,539.28

Auditor's Report

Birmingham, Ala., November 12, 1921.

To the Southern Medical Association:

As requested by the Chairman of your Council, I have examined and checked the records and books of account of your Association for the period beginning November 1, 1914, and ending October 31, 1921, and those of the Southern Medical Journal Company for the period beginning November 1, 1918, and ending October 31, 1921.

The cash receipts have been verified, and the classification of same as reflected by the cash books has

been found to be absolutely correct. It is to be noted that you have a very accurate method of entering each receipt for dues of the Association, in its numerical order, the number in the cash book corresponding to the number on the Membership Card issued as a receipt. This method makes for ease in checking and crediting the various receipts to the proper card in the index. I have checked a number of cards at random, both from the cash books to the cards, and vice versa, in order to verify the system.

The disbursements have been carefully checked with the vouchers and found to be correctly recorded and distributed among the various accounts.

I have found the income accounts of the Southern Medical Journal Company (Advertising, Subscriptions, Reprints, etc.), carefully and accurately recorded.

I have also examined the balance sheets made by Mr. C. P. Loranz from time to time, and in my opinion they truly represent the financial condition of the Association and the Journal at all times.

As the purpose of the audit of the Southern Medical Journal Company is particularly to verify the statement of profits for the fiscal years ending October 31, 1919, 1920 and 1921, I give below the net profits for the three years in question, and it is my opinion that these figures reflect the actual earnings for those years:

November 1, 1918, to October 31, 1919.....$5,658.15
November 1, 1919, to October 31, 1920..... 5,486.58
November 1, 1920, to October 31, 1921..... 5,473.11

The accounts and records are entirely up to date and in order, no obscure entries or incomplete records of any character being found by me.

It is my opinion that the system or method of accounting could not be improved upon.

Respectfully submitted,
(Signed) E. T. MACLEAN,
Public Accountant.

Subscribed and sworn to before me, on this the 29th day of December, 1921.

(Signed) SUMNER LEE WHITE,
Notary Public.

COMPARATIVE STATEMENT OF EXPENSES AND REVENUE, SOUTHERN MEDICAL ASSOCIATION

	Oct. 31, 1916	Oct. 31, 1917	Oct. 31, 1918	Oct. 31, 1919	Oct. 31, 1920	Oct. 31, 1921
Stationery and Printing	$1,276.51	$1,084.24	$1,052.54	$ 558.90	$2,601.71	$ 3,198.53
Postage	904.50	1,281.73	480.63	970.60	650.00	1,372.50
Salaries	2,044.60	2,159.12	1,843.50	1,713.50	2,115.00	2,729.00
General Expense	160.50	688.19	596.95	78.49	300.05	111.85
Traveling Expense	993.52	502.27	436.84	103.60	950.40	432.15
Telegraph and Telephone	116.89	101.31	73.41	97.98	54.22	291.31
Interest and Discount	101.47	.30				
Commissions	13.85	35.56	142.91	20.75	9.00	
Office Rent	200.00	180.00	180.00	180.00	210.00	270.00
Profit and Loss	25.60	18.00			77.50	
Expenses at Louisville						3,065.05
	$5,837.44	$6,350.72	$4,806.78	$3,753.82	$6,970.88	$11,470.72
Dues	$14,640.80	$14,355.50	$10,550.00	$13,208.68	$17,846.00	$19,209.50
Exhibit Funds	548.02	1,750.00	882.50	none	1,130.00	4,820.00
	$5,837.44	$15,188.82	$6,350.72	$16,105.50	$1,806.78	$11,432.50	$3,753.82	$13,208.68	$6,970.88	$18,976.00	$11,470.72	$24,029.50
Less Jour. Subscriptions	9,766.49			9,583.70	7,033.25			$8,815.40	11,903.15		$12,206.80
	$5,837.44	$5,422.33	$6,350.72	$6,521.80	$4,806.78	$4,399.25	$3,753.82	$4,393.28	$6,970.88	$ 7,072.85	$11,170.72	$11,822.70
Deficit	$ 415.11				$ 407.53							
Surplus		$171.08				$639.16		$101.97				$351.98

MEMBERSHIP BY STATES

The following is a comparative statement of the membership of the Southern Medical Association by states for the past ten years:

	1912	1913	1914	1915	1916	1917	1918	1919	1920	1921
Alabama	210	294	363	377	498	528	501	553	512	543
Arkansas	19	133	190	196	227	212	209	283	279	330
District of Columbia	11	24	52	68	66	56	48	48	55	61
Florida	133	210	250	276	278	252	192	204	204	222
Georgia	136	200	251	293	477	638	592	629	576	567
Kentucky	14	140	295	283	261	226	173	189	317	434
Louisiana	133	174	239	232	286	277	246	254	228	244
Maryland	20	38	74	110	130	178	151	166	205	219
Mississippi	215	336	308	291	286	314	328	372	388	395
Missouri					108	112	107	111	178	203
North Carolina	37	102	248	274	303	317	290	353	431	435
Oklahoma		25	131	107	207	203	173	187	195	269
South Carolina	30	79	171	176	242	266	221	263	285	341
Tennessee	182	212	302	320	410	494	500	538	533	541
Texas	31	147	204	607	1100	1025	923	902	800	841
Virginia	35	106	238	371	356	314	299	300	324	333
West Virginia	7	32	55	76	70	71	51	56	200	185
Other states	5	8	30	35	55	89	58	55	66	66
Totals	1243	2257	3382	4096	5340	5628	5183	5466	5795	6238

GOLF TOURNAMENT

It is safe to say that there is no outdoor sport so popular with physicians as golf. Realizing this, a tournament was proposed for one of the features of the Hot Springs meeting of the Southern Medical Association. Dr. E. R. Smith was made Chairman of the Golf Committee. A better selection could not have been made, for he organized the tournament well. The Hot Springs Committee provided some very handsome cups for prizes.

The tournament lasted over the first three days of the meeting and consisted of two flights in eighteen holes each. The first flight was for the Southern Championship, which was won by Dr. Fred W. Bailey, of St. Louis, whose score was eighty-four. The runner-up was Dr. W. A. Clark, of Jefferson City, Mo. The handicap match was played on the third day and the handicaps were given on the basis of the score made in the championship flight. Dr. W. A. Cook, of Tulsa, Okla., and Dr. W. B. Owen, of Louisville, Ky., tied in this flight with a net score of seventy-one. By tossing a coin Dr. W. A. Cook was declared the winner and he received the handicap cup, while Dr. Owen was given the runner-up cup.

Forty-five players entered the Southern Championship and all but a few participated in the handicap match.

The tournament was played on the Hot Springs Country Club Golf Course, conceded to be one of the finest in the whole South.

An attempt was made to form a Southern Medical Golf Association, but no time could be procured for the meeting. However, next year some permanent type of organization is contemplated and will unquestionably be executed at Chattanooga.

SECTION ON MEDICINE

Officers

Chairman—Dr. Bryce W. Fontaine, Memphis, Tenn.
Vice-Chairman—Dr. Thompson Frazer, Asheville, N. C.
Secretary—Dr. Allan Eustis, New Orleans, La.

Monday, November 14, 7:00 p. m.

A joint session of the Section on Medicine and Section on Radiology was held in the private dining room of the Arlington Hotel. A plate dinner was served, after which Dr. Bryce W. Fontaine, Memphis, Tenn., Chairman of the Section on Medicine, called the meeting to order and introduced Dr. Kennon Dunham, Cincinnati, Ohio, who spoke on the subject "X-Ray Classification of Pulmonary Tuberculosis as Applied to Prognosis and Treatment," illustrated by lantern slides.

Dr. Louis V. Hamman, Baltimore, Md., followed with a paper on "Pulmonary Tuberculosis," after which the joint session adjourned.

Tuesday, November 15, 2:00 p. m.

The Section met in Room A of the Eastman Hotel, Hot Springs, Ark., and was called to order by the Chairman, Dr. Bryce W. Fontaine, Memphis, Tenn., who stated he had no formal address to make, but simply desired to express himself as deeply grateful of the honor of presiding over the deliberations of this Section.

The Secretary, Dr. Allan Eustis, New Orleans, La., read a communication from Dr. W. A. Mulherin pointing out the advantages to be derived from all sections of this Association meeting in half day sessions. A resolution requesting the Council to adopt this plan was read and passed by the Section. (See report of Council for text of resolution.)

Dr. Ernest H. Gaither, Baltimore, Md., read a paper entitled "Rational Therapy in Digestive Diseases," which was discussed by Drs. Seale Harris, Birmingham, Ala.; George M. Niles, Atlanta, Ga.; D. C. Walt, Little Rock, Ark.; George C. Mizell, Atlanta, Ga.; Douglas VanderHoof, Richmond, Va.; John M. Bell, St. Joseph, Mo., and in closing by the essayist.

Dr. K. H. Beall, Fort Worth, Tex., read a paper entitled "Glosso-Pyrosis," which was discussed by Drs. George C. Mizell, Atlanta, Ga.; Stewart R. Roberts, Atlanta, Ga.; Otis S. Warr, Memphis, Tenn.; George Dock, St. Louis, Mo.; E. Bates Block, Atlanta, Ga.; Charles L. Minor, Asheville, N. C.; Walter E. Vest, Huntington, W. Va., and in closing by the essayist.

Dr. G. C Kilpatrick, Mobile, Ala., read a paper entitled "Prevalence of Entamebic Disease, Diagnosis and Treatment," which was discussed by Drs. Sidney K. Simon, New Orleans, La.; J. B. Fitts, Atlanta, Ga.; W. E. Deeks, New York, N. Y.; J. M. Bell, St. Joseph, Mo.; A. L. Levin, New Orleans, La.; Elliott C. Prentiss, El Paso, Tex.; C. M. Grigsby, Dallas, Tex.; C. A. Ray, Charleston, W. Va.; C. C. Bass, New Orleans, La., and in closing by the essayist.

Dr. C. W. Dowden and Dr. C. D. Enfield, Louisville, Ky., presented a joint paper entitled "The Duodenal Tube in the Study of Liver and Pancreatic Pathology," which was discussed by Drs. J. E. Paullin, Atlanta, Ga.; Rowan Morrison, Louisville, Ky.; George M. Niles, Atlanta, Ga., and in closing by Dr. Dowden.

The Chairman appointed as a Nominating Committee Drs. G. Canby Robinson, Baltimore, Md.; W. R. Houston, Augusta, Ga., and Kenneth M. Lynch, Dallas, Tex.

Dr. W. W. Duke, Kansas City, Mo., read a paper entitled "Food Allergy as a Cause of Abdominal Pain," which was discussed by Drs. M. L. Graves, Galveston, Tex.; G. Canby Robinson, Baltimore, Md.; I. S. Kahn, San Antonio, Tex., and in closing by the essayist.

The Section adjourned until 9:30 a. m. Wednesday.

Wednesday, November 16, 9:30 a. m.

The Section was called to order by the Chairman.

Dr. J. E. Paullin, Atlanta, Ga., read a paper entitled "A Study of the Glucose Tolerance Test in the Obese," which was discussed by Drs. Louis V. Hamman, Baltimore, Md.; Elliott P. Joslin, Boston, Mass.; J. S. McLester, Birmingham, Ala.; Stewart R. Roberts, Atlanta, Ga.; W. H. Olmstead, St. Louis, Mo., and in closing by the essayist.

Dr. Elliott P. Joslin, Boston, Mass., read a paper entitled "A Discussion of the Newer Methods in the Treatment of Diabetes," which was discussed by Drs. James S. McLester, Birmingham, Ala.; I. I. Lemann, New Orleans, La.; Lewellys F. Barker, Baltimore, Md.; Louis V. Hamman, Baltimore, Md.; Neuton S. Stern, Memphis, Tenn.; J. B. McElroy, Memphis, Tenn., and in closing by the essayist.

A joint paper by Drs. Sidney R. Miller and Walter Baetjer, Baltimore, Md., entitled "The Clinical Value of Protein Sensitization Tests," was read by title and ordered published in the proceedings of the Section.

Dr. C. M. Grigsby and Dr. Ramsey H. Moore, Dallas, Tex., presented a joint paper on "Sporotrichosis with Report of a Case," which was discussed by Drs. George Dock, St. Louis, Mo.; William Litterer, Nashville, Tenn.; Lewellys F. Barker, Baltimore, Md., and in closing by the essayists.

Dr. Kenneth M. Lynch, Dallas, Tex., read a paper entitled "Tartar Emetic in the Treatment of Granulomata Inguinale and Other Granulomata and Granulating Ulcers," which was discussed by Drs. John A. Lanford, New Orleans, La.; J. C. McMichel, Houston, Tex.; Marcus Haas, Memphis, Tenn.; M. D. Levy, Galveston, Tex., and in closing by the essayist.

The Section adjourned until 2:00 p. m.

Wednesday, November 16, 2.00 p. m.

The Section was called to order by the Chairman.

Dr. Thompson Frazer and Dr. John D. MacRae, Asheville, N. C., presented a paper entitled "Aortitis with X-Ray Findings," which was discussed by Drs. J. B. McElroy, Memphis, Tenn.; C. L. Martin, Dallas, Tex.; John D. MacRae, Asheville, N. C.; George M. Niles, Atlanta, Ga.; I. I. Lemann, New Orleans, La.; J. B. Guthrie, New Orleans, La.; Charles L. Minor, Asheville, N. C.; A. L. Gray, Richmond, Va., and in closing by Dr. Frazer.

Dr. G. Canby Robinson, Baltimore, Md., read a paper entitled "Abnormalities of the Heart Rate," which was discussed by Drs. J. T. Halsey, New Orleans, La.; Stewart R. Roberts, Atlanta, Ga.; Lewellys F. Barker, Baltimore, Md.; Frank A. Jones, Memphis, Tenn.; John G. McLaurin, Dallas, Tex.; Robert B. Giles, Dallas, Tex., and in closing by the essayist.

Dr. Ellsworth S. Smith, St. Louis, Mo., read a paper entitled "Report of a Case of Cardiac Aneurysm Complicated with Chronic Mediastinal Pericarditis with Post-Mortem Findings," which was discussed by Drs. James S. McLester, Birmingham, Ala.; Frank A. Jones, Memphis, Tenn.; J. B. McElroy, Memphis, Tenn.; E. Bates Block, Atlanta, Ga.; J. O. Elrod, Forsyth, Ga., and in closing by the essayist.

Dr. Neuton S. Stern, Memphis, Tenn., read a paper entitled "The Murmur of Mitral Stenosis in the Presence of Auricular Fibrillation," which was discussed by Drs. G. Canby Robinson, Baltimore, Md.; Randolph Lyons, New Orleans, La., and in closing by the essayist.

Dr. Randolph Lyons, New Orleans, La., read a paper entitled "Pulsus Alternans; Its Significance and Recognition by Ordinary Clinical Methods," which was discussed by Drs. Stewart R. Roberts, Atlanta, Ga.; Frank A. Jones, Memphis, Tenn.; J. L. Green, Hot Springs, Ark.; Allan Eustis, New Orleans, La.; G. Canby Robinson, Baltimore, Md.; John A. Witherspoon, Nashville, Tenn., and in closing by the essayist.

The Section adjourned until 9:30 a. m. Thursday.

Thursday, November 17, 9:30 a. m.

The Section was called to order by the Chairman.

The Secretary read the report of the Nominating Committee, which was as follows: For Chairman, Dr. M. L. Graves, Galveston, Tex.; Vice-Chairman, Dr. Loyd Thompson, Hot Springs, Ark.; Secretary, Allan Eustis, New Orleans, La.

Dr. Douglas VanderHoof moved that nominations be closed and the Secretary be instructed to cast the ballot of the Section for these nominees. Seconded and unanimously carried.

Dr. D. D. Paulus, Oklahoma City, Okla., read a paper entitled "The Significance and Diagnosis of Cardiac Anginal Pains," which was discussed by Drs. Douglas VanderHoof, Richmond, Va.; E. B. Bradley, Lexington, Ky.; John A. Witherspoon, Nashville, Tenn.; W. H. Witt, Nashville, Tenn.; George Dock, St. Louis, Mo., and in closing by the essayist.

Dr. I. S. Kahn, San Antonio, Tex., read a paper entitled "Spontaneous Pneumothorax in Tuberculosis," which was discussed by Drs. Charles L. Minor, Asheville, N. C.; Wallace J. Durel, New Orleans, La.; C. H. Cock, Asheville, N. C.; Louis V. Hamman, Baltimore, Md.; George Dock, St. Louis, Mo.; L. J. Moorman, Oklahoma City, Okla., and in closing by the essayist.

Dr. W. H. Olmstead, St. Louis, Mo., read a paper entitled "Procedure for Demonstrating the Power of the Kidney to Concentrate and Diurese the Normal Constituents of the Urine," which was discussed by Drs. Louis V. Hamman, Baltimore, Md.; C. W. Dowden, Louisville, Ky.; George Dock, St. Louis, Mo., and in closing by the essayist.

Dr. J. B. Guthrie, New Orleans, La., read a paper entitled "Influence of Posture on Physical Signs in the Chest," which was discussed by Drs. L. J. Moorman, Oklahoma City, Okla.; Charles L. Minor, Asheville, N. C., and in closing by the essayist.

Dr. Walter E. Vest, Huntington, W. Va., read a paper entitled "Rat Bite Fever, with Report of a Case," which was discussed by Drs. John B. McElroy, Memphis, Tenn.; J. J. Terrell, Dallas, Tex.; David W. Carter, Dallas, Tex.; William Litterer, Nashville, Tenn.; T. C. Terrell, Fort Worth, Tex., and in closing by the essayist.

The Chairman, Dr. Fontaine, on behalf of the Section, thanked the Secretary, Dr. Eustis, for his efficient services and for the splendid program he had prepared. He stated that Dr. Eustis had absolutely done all this work without any aid from the present Chairman or from any of the former chairmen of the Section. He thanked the members for their splendid papers and for their snappy discussions.

Section adjourned sine die.

SECTION ON PEDIATRICS

Officers

Chairman—Dr. William A. Mulherin, Augusta, Ga.
Vice-Chairman—Dr. W. McKim Marriott, St. Louis, Mo.
Secretary—Dr. J. Buren Sidbury, Wilmington, N. C.
Executive Committee—Dr. L. T. Royster, Norfolk, Va.; Dr. J. D. Love, Jacksonville, Fla., and Dr. Wm. A. Mulherin, Augusta, Ga.

Tuesday, November 15, 2:00 p. m.

The Section met in the Knights of Pythias Hall, Hot Springs, Ark., and was called to order by the Chairman.

The plan to have all Sections of this Association meet in half day sessions was taken up and discussed, and a resolution requesting the Council to adopt this plan was read and unanimously approved. (See report of Council for text of resolution.)

Dr. William A. Mulherin, Augusta, Ga., then read his Chairman's Address entitled "Southern Pediatrics—Retrospective and Prospective."

Dr. Fritz B. Talbot, Boston, Mass., read a paper entitled "Body Mechanics, Its Relation to the Health of Children," which was discussed by Drs. T. C. Sanders, Shawnee, Okla.; John Zahorsky, St. Louis, Mo.; L. R. DeBuys, New Orleans, La.; John T. O'Ferral, New Orleans, La.; Robert A. Strong, Pass Christian, Miss.; Walter D. Brown, Beaumont, Tex., and in closing by the essayist.

Dr. W. McKim Marriott, St. Louis, Mo., read a paper entitled "The Teaching of Infant Feeding," which was discussed by Drs. McGuire Newton, Richmond, Va.; F. C. Moor, Tallahassee, Fla.; H. Leslie Moore, Dallas, Tex.; John Zahorsky, St. Louis, Mo.; Eugene Rosamond, Memphis, Tenn.; Fritz B. Talbot, Boston, Mass., and in closing by the essayist.

Dr. Hugh McCulloch, St. Louis, Mo., read a paper entitled "On the Tolerance of Children for Digitalis," which was discussed by Drs. W. McKim Marriott, St. Louis, Mo.; H. Leslie Moore, Dallas, Tex.; G. Canby Robinson, Baltimore, Md., and in closing by the essayist.

Dr. Laurence R. DeBuys, New Orleans, La., read a paper entitled "The Newly-Born Service," which was discussed by Drs. Hugh McCulloch, St. Louis, Mo.; Robert A. Strong, Pass Christian, Miss.; Fritz B. Talbot, Boston, Mass.; J. Ross Snyder, Birmingham, Ala.; Eugene Rosamond, Memphis, Tenn.; J. O. Elrod, Forsyth, Ga.; George C. Mosher, Kansas City, Mo.; W. McKim Marriott, St. Louis, Mo.; B. G. Hamilton, Kansas City, Mo.; Oliver Hill, Knoxville, Tenn.; W. A. Fowler, Oklahoma City, Okla.; E. A. Hines, Seneca, S. C.; Calvin R. Hannah, Dallas, Tex., and in closing by the essayist.

Dr. Philip F. Barbour, Louisville, Ky., read a paper entitled "Fat Intolerance," which was discussed by Drs. J. Ross Snyder, Birmingham, Ala.; W. W. Harper, Selma, Ala.; W. McKim Marriott, St. Louis, Mo.; Fritz B. Talbot, Boston, Mass.; L. B. Clark, Atlanta, Ga., and in closing by the essayist.

The Section adjourned until 9:30 a. m. Wednesday.

Wednesday, November 16, 9:30 a. m.

The Section was called to order by the Chairman.

Drs. William M. Taylor and L. J. Moorman, Oklahoma City, Okla., presented a paper entitled "Tuberculosis in Infancy and Childhood," which was discussed by Drs. Thompson Frazer, Asheville, N. C.; J. J. Singer, St. Louis, Mo.; Philip F. Barbour, Louisville, Ky.; L. B. McBrayer, Sanatorium, N. C.; I. S. Kahn, San Antonio, Tex.; J. W. Laws, El Paso, Tex.; L. B. McBrayer, Sanatorium, N. C.; W. McKim Marriott, St. Louis, Mo.; W. W. Harper, Selma, Ala., and in closing by Dr. Moorman.

Dr. A. S. Root, Raleigh, N. C., read a paper entitled "Toxin-Antitoxin or Active Immunization," which was discussed by Drs. J. S. Mitchener, Raleigh, N. C.; J. Buren Sidbury, Wilmington, N. C.; Arthur G. Jacobs, Memphis, Tenn.; Howard L. Cockerham, Gunnison, Miss.; H. Leslie Moore, Dallas, Tex.; B. E. Greer, Dallas, Tex.; Hugh McCulloch, St. Louis, Mo.; Eugene Rosamond, Memphis, Tenn.; W. W. Harper, Selma, Ala.; R. A. Douglass, Huntingdon, Tenn.; W. A. Mulherin, Augusta, Ga.; S. J. Gill, Roanoke, Va., and in closing by the essayist.

Dr. Ralph C. Spence, Dallas, Tex., read a paper entitled "Infectious Diarrhea in Young Children," which was discussed by Drs. Frank C. Neff, Kansas City, Mo.; W. McKim Marriott, St. Louis, Mo.; J. Ross Snyder, Birmingham, Ala.; John Zahorsky, St. Louis, Mo.; Arthur G. Jacobs, Memphis, Tenn.; Stewart H. Welch, Birmingham, Ala.; Charles E. Boynton, Atlanta, Ga.; W. McKim Marriott, St. Louis, Mo., and in closing by the essayist.

Wednesday, November 16, 2:00 p. m.

The Section was called to order by the Chairman.

Dr. E. A. Hines, Seneca, S. C., read a paper entitled "The Summer Peak of Infant Mortality in South Carolina, 1921, and the Preventive Measure Instituted," which was discussed by Drs. A. S. Root, Raleigh, N. C.; Robert A. Strong, Pass Christian, Miss.; W. W. Harper, Selma, Ala., and in closing by the essayist.

Dr. Edward Clay Mitchell, Memphis, Tenn., read a paper entitled "Infections of the Urinary Tract with Report of 400 Cases," which was discussed by Drs. J. Ross Snyder, Birmingham, Ala.; Frank C. Neff, Kansas City, Mo.; Robert A. Strong Pass Christian, Miss.; John Zahorsky, St. Louis, Mo.; W. McKim Marriott, St. Louis, Mo., and in closing by the essayist.

Dr. Frank C. Neff, Kansas City, Mo., read a paper entitled "Temperature Variability in Certain Apparently Normal Children," which was discussed by Drs. Robert A. Strong, Pass Christian, Miss.; J. Ross Snyder, Birmingham, Ala.; J. O. Elrod, Forsyth, Ga., and in closing by the essayist.

Dr. McGuire Newton, Richland, Va., read a paper entitled "The Defective Child—A Problem," which was discussed by Drs. C. E. Boynton, Atlanta, Ga.; Edward C. Mitchell, Memphis, Tenn.; Tom A. Williams, Washington, D. C.; Paul V. Anderson, Richmond, Va.; B. L. Wyman, Birmingham, Ala.; W. W. Harper, Selma, Ala.; W. J. Otis, New Orleans, La., and in closing by the essayist.

Dr. Lee Ben Clark, Atlanta, Ga., read a paper entitled "A Further Report on the Classification of Birth Paralyses as Endocrines."

Dr. W. W. Harper, Selma, Ala., read a paper entitled "Endocrines in Children."

Papers of Drs. Clark and Harper were discussed jointly by Drs. John Zahorsky, St. Louis, Mo.; A. J. Jacobs,

Memphis, Tenn.; W. J. Otis, New Orleans, La.; A. S. Root, Raleigh, N. C.; Tom A. Williams, Washington, D. C.; Philip F. Barbour, Louisville, Ky.; Oliver Hill, Knoxville, Tenn., and in closing by the essayists.

Dr. Philip F. Barbour, Louisville, Ky., moved a rising vote of thanks to our guest, Dr. Fritz B. Talbot, for his very interesting paper. Seconded and unanimously carried.

Section adjourned until 9:30 a. m. Thursday.

Thursday, November 16, 9:30 a. m.

Section was called to order by the Chairman.

Dr. E. A. Hines, Seneca, S. C., and Dr. A. S. Root, Raleigh, N. C., were appointed members of the Executive Committee in the absence of Drs. Love and Royster.

Dr. Robert H. Strong, Pass Christian, Miss., presented a case report entitled "An Exceptionally Interesting Case of Pellagra in a Young Child," which was discussed by Dr. L. R. DeBuys, New Orleans, La.

Dr. W. L. Funkhouser, Atlanta, Ga., presented a case report entitled "Encephalo-Meningocele Through the Foramen Caecum," which was discussed by Drs. W. McKim Marriott, St. Louis, Mo., and in closing by the essayist.

Dr. Eugene Rosamond, Memphis, Tenn., presented a case report entitled "Intra Cranial Hemorrhage in the Newly Born," which was discussed by Drs. John Zahorsky, St. Louis, Mo.; W. McKim Marriott, St. Louis, Mo.; S. E. Kernodle, Oklahoma City, Okla., and in closing by the essayist.

Dr. W. W. Harper, Selma, Ala., presented a case report entitled "Severe Intra-Abdominal Trauma without Symptoms."

Dr. J. Ross Snyder, Birmingham, Ala., presented a case report entitled "Four Cases of Jaundice in Older Children Occurring in the Same Month," which was discussed by Drs. John Zahorsky, St. Louis, Mo.; W. W. Harper, Selma, Ala.; Robert A. Strong, Pass Christian, Miss., and in closing by the essayist.

Dr. L. R. DeBuys, New Orleans, La., presented a case report entitled "Case of Asthma Associated with a Chronic Appendix," which was discussed by Drs. C. E. Boynton, Atlanta, Ga.; Philip F. Barbour, Louisville, Ky.; John Zahorsky, St. Louis, Mo., and in closing by the essayist.

Dr. Charles E. Boynton, Atlanta, Ga., presented a case report entitled "An Apparently Hopeless Case of Polyglandular Disturbance with Completely Arrested Sexual Development in a Boy Seventeen and One-Half Years—Treated—Complete Cure at Twenty-One Years," which was discussed by Drs. H. Leslie Moore, Dallas, Tex., and in closing by the essayist.

Dr. Oliver W. Hill, Knoxville, Tenn., presented a case report entitled "Micrococcus Lanceolatus Meningitis with Autopsy Report."

Dr. H. Leslie Moore, Dallas, Tex., presented a case report entitled "Report of a Case of Hypertrophic Pyloric Stenosis Complicated with Marked Pylorospasm," which was discussed by Drs. John Zahorsky, St. Louis, Mo.; W. W. Harper, Selma, Ala.; C. E. Boynton, Atlanta, Ga.; A. G. Jacobs, Memphis, Tenn.; Eugene Rosamond, Memphis, Tenn.; W. McKim Marriott, St. Louis, Mo.; L. R. DeBuys, New Orleans, La.; Philip F. Barbour, Louisville, Ky.; L. B. Clark, Atlanta, Ga.; Ralph C. Spence, Dallas, Tex.; W. McKim Marriott, St. Louis, Mo., and in closing by the esayist.

The Executive Committee made the following report:

1. That the members of this Section become active in carrying out the decision reached at our Asheville meeting, 1919, relative to organizing in each Southern state and the District of Columbia a state pediatric society. We believe by such organization the purpose of this Section will be better fulfilled, its scope of usefulness augmented, and better pediatric practice will prevail in our Southland.

2. That the election of Secretary of our Section be for the term of two years. In explanation of this recommendation we wish to state that the Executive Committee of last year wisely recommended in their report that, beginning with the year 1921, the Secretary be elected for a term of two or three years. The Section received and adopted their recommendations as read. Since then some uncertainty has existed as to whether the term of office be for two or three years.

3. That this Section adopt and put into active practice the recommendation as issued by the Council of the Southern Medical Association last year at the Louisville meeting, reading as follows:

"That any essayist or member reporting a case whose name appears on the program of an annual meeting in this Section, who shall fail to be present and present his paper without having in the hands of the Section officers good and sufficient reasons for not being present, shall be denied the privilege of presenting a paper in that or any other section of the Association for a period of two years."

4. That the incoming Chairman of the Section be empowered to appoint the personnel of our Publicity Committee during his term of office.

5. That a standing committee on Infant and Child Welfare be appointed. This committee is to consist of three members and to be appointed by the Chair.

6. That this Section extends to the Garland County-Hot Springs Medical Society and to the Knights of Pythias its sincere thanks for their many acts of kindness in making our visit to their city such a pleasurable one.

It was moved that the report of the Committee be adopted. Seconded and unanimously carried.

The following officers were elected:

Chairman: Dr. J. Ross Snyder, Birmingham, Ala.

Vice-Chairman: Dr. Laurence R. DeBuys, New Orleans, Louisiana.

Secretary: Dr. Oliver W. Hill, Knoxville, Tenn.

Section adjourned sine die.

SECTION ON NEUROLOGY AND PSYCHIATRY

Officers

Chairman—Dr. Tom A. Williams, Washington, D. C.
Vice-Chairman—Dr. John J. Moren, Louisville, Ky.
Secretary—Dr. Paul V. Anderson, Richmond, Va.

Monday, November 14, 9:30 a. m.

The Section met in Room E, Eastman Hotel, Hot Springs, Ark., and was called to order by the Chairman.

Minutes of previous meeting were read and approved.

The Chairman presented the plan of Dr. Mulherin of having the scientific sections meet in the future in half day sessions and presented a resolution requesting the Council to make this change in the section meetings. On motion it was moved and unanimously carried that a committee of three be appointed by the Chairman to consider the plan and report back at the afternoon session. The Chairman appointed on this Committee Dr. E. Bates Block, Atlanta, Ga.; Dr. Paul V. Anderson, Richmond, Va., and Dr. W. G. Somerville, Memphis, Tenn.

Dr. Tom A. Williams, Washington, D. C., read his Chairman's Address entitled "The Teaching of Neurology, Psychiatry, Psychopathology and Their Relation to General Medicine and Other Specialties, in Particular the Eye, Ear, Children, Orthopedics, Gastro-Enterology and Genito-Urinary Disease."

The Chairman, after reading his address, extended the privileges of the floor to all invited guests. He also made an announcement regarding the Section plate dinner which was to be served that evening at the Arlington Hotel.

The paper of Dr. Beverley R. Tucker, Richmond, Va., entitled "Muscular Atrophies and Dystrophies Contrasted with Emaciation" was read by title, Dr. Tucker not being able to attend the meeting owing to the serious illness of his wife.

Dr. M. L. Graves, Galveston, Tex., read a paper entitled "Progressive Lenticular Degeneration" (illustrated with photos), which was discussed by Drs. George M. Eckel, Hot Springs, Ark.; E. Bates Block, Atlanta, Ga.; G. L. Echols, Milledgeville, Ga.; Louis G. Beall, Black Mountain, N. C.; Tom A. Williams, Washington, D. C., and in closing by the essayist.

Dr. E. Bates Block, Atlanta, Ga., read a paper entitled "An Unusual Case of Hysteria," which was discussed by Drs. W. R. Houston, Augusta, Ga.; B. L. Wyman, Birmingham, Ala.; J. H. Randolph, Jacksonville, Fla.; Louis E. Bisch, Asheville, N. C.; L. L. Cazenavette, New Orleans, La.; G. H. Benton (Miami, Fla.), U.S.P.H.S., Gulfport, Miss.; W. J. Otis, New Orleans, La.; James J. Terrill, Dallas, Tex.; Tom A. Williams, Washington, D. C., and in closing by the essayist.

The Section adjourned until 2:00 p. m.

Monday, November 14, 2:00 p. m.

The Section was called to order by the Chairman.

Prof. John M. Fletcher, Ph.D., Professor of Psychology and Education of Tulane University and Sophie Newcomb College, New Orleans, La., read a paper entitled "An Evaluation of Intelligence Tests," which was discussed by Dr. G. H. Benton (Miami, Fla.), U.S.P.H.S., Gulfport, Miss., and in closing by the essayist.

Dr. Ross M. Chapman, Towson, Md., read a paper entitled "Early Recognition of Mental Disease."

Dr. Sidney Schwab, St. Louis, Mo., read a paper entitled "Psycho Neuroses in Their Incipience."

Dr. Louis E. Bisch, Asheville, N. C., read a paper entitled "Early Manifestations of Psycho-Neuroses."

Papers of Dr. Chapman, Dr. Schwab and Dr. Bisch were discussed jointly by Drs. Tom A. Williams, Washington, D. C.; W. G. Somerville, Memphis, Tenn.; J. J. Terrill, Dallas, Tex.; George L. Echols, Milledgeville, Ga.; W. G. Otis, New Orleans, La.; B. L. Wyman, Birmingham, Ala.; Louis G. Beall, Black Mountain, N. C.; R. C. Bunting, Memphis, Tenn., and in closing by the essayists.

Dr. G. H. Benton (Miami, Fla.), U.S.P.H.S., Gulfport, Miss., read a paper entitled "Evidences of Inadaptibility of ex-Service Men," which was discussed by Drs. Tom A. Williams, Washington, D. C.; Paul V. Anderson, Richmond, Va.; J. H. Randolph, Jacksonville, Fla.; W. J. Otis, New Orleans, La.; C. C. Kirk, Little Rock, Ark., and in closing by the essayist.

Dr. R. E. Semmes, Memphis, Tenn., read a paper entitled "Bilateral Acoustic Tumors with Report of an Unusual Case," which was discussed by Dr. Ernest Sachs, St. Louis, Mo., and in closing by the essayist.

It was noted at the end of the scientific session that every essayist on the program was present except one and he was detained because of the serious illness of his wife.

On motion the Secretary was instructed to send a telegram to Dr. Beverley R. Tucker advising him of the success of the meeting, expressing the Section's regret at his absence and voicing the sincere hope that his wife would speedily recover.

Dr. E. Bates Block, Chairman of the special committee to report on the half day session plan, reported that the committee favored the plan and recommended the adoption of the resolution. The resolution was then unanimously adopted. (See report of Council for text of resolution.)

The Section then proceeded with the election of officers for the ensuing year with the following result:

Chairman: Dr. E. Bates Block, Atlanta, Ga.
Vice-Chairman: Dr. M. L. Graves, Galveston, Tex.
Secretary: Dr. L. L. Cazenavette, New Orleans, La.

It was moved and carried that a vote of gratitude and thanks be extended to the Chairman, Dr. Williams, and the Secretary, Dr. Anderson, for the magnificent program which they had given for this meeting.

It was also moved and seconded that a rise of thanks be tendered the Garland County-Hot Springs medical profession, the railroads, press, hotels, bath houses, city officials and the citizens of Hot Springs who, by their cordial reception and hearty co-operation, contributed so greatly toward the success of this meeting.

The Section adjourned sine die.

SOUTHERN GASTRO-ENTEROLOGICAL ASSOCIATION

Officers

President—Dr. George M. Niles, Atlanta, Ga.
Vice-President—Dr. Marvin H. Smith, Jacksonville, Fla.
Secretary—Dr. J. B. Fitts, Atlanta, Ga.

Monday, November 14, 9:30 a. m.

The Southern Gastro-Enterological Association, meeting conjointly with the Southern Medical Association, met in Room A, Eastman Hotel, Hot Springs, Ark., and was called to order by the President, Dr. George M. Niles, Atlanta, Ga., who read his President's Address entitled "An Analysis, Clinical and Otherwise, of Four Hundred Non-Surgical Drainages of Pathologic Gall-Bladders."

Dr. A. L. Levin, New Orleans, La., read a paper entitled "My Observations with Hepatic Extract (Soluble) as a Remedial Agent," which was discussed by Drs. G. C. Mizell, Atlanta, Ga.; J. L. Jelks, Memphis, Tenn.; Elliott C. Prentiss, El Paso, Tex.; Daniel N. Silverman, New Orleans, La., and in closing by the essayist.

Dr. Elliott C. Prentiss, El Paso, Tex., read a paper entitled "The Possible Relation of Secretin to Cancer," which was discussed by Drs. J. C. Johnson, Atlanta, Ga.; Irving Abell, Louisville, Ky.; J. L. Jelks, Memphis, Tenn.; Charles G. Lucas, Louisville, Ky.; A. L. Levin, New Orleans, La., and in closing by the essayist.

In the absence of Dr. Julius Friedenwald, Baltimore, Md., his paper entitled "The Clinical Significance of Abdominal Adhesions," was read by the Secretary, Dr. J. B. Fitts, and was discussed by Drs. G. C. Mizell, Atlanta, Ga.; J. L. Jelks, Memphis, Tenn.; J. C. Johnson, Atlanta, Ga.; A. L. Levin, New Orleans, La., and Irving Abell, Louisville, Ky.

Dr. Seale Harris read a paper entitled "Gastroptosis," which was discussed by Drs. J. C. Johnson, Atlanta, Ga.; John M. Bell, St. Joseph, Mo.; A. L. Levin, New Orleans, La.; J. L. Jelks, Memphis, Tenn.; G. C. Mizell, Atlanta, Ga.; George W. F. Rembert, Jackson, Miss., and in closing by the essayist.

The meeting adjourned until 2:00 p. m.

Monday, November 14, 2:00 p. m.

The meeting was called to order by the President

Dr. J. E. Knighton, Shreveport, La., read a paper entitled "Lamblia Intestinalis, with Report of Cases."

Dr. Sidney K. Simon, New Orleans, La., read a paper entitled "Further Observations on Lamblia Intestinalis Infestation and Its Treatment."

Papers of Dr. Knighton and Dr. Simon were discussed by Drs. J. L. Jelks, Memphis, Tenn.; A. L. Levin, New Orlens, La.; Charles G. Lucas, Louisville, Ky.; John A. Witherspoon, Nashville, Tenn.; Bryce W. Fontaine, Memphis, Tenn.; Daniel N. Silverman, New Orleans, La.; John M. Bell, St. Joseph, Mo.; Elliott C. Prentiss, El Paso, Tex., and in closing by the essayists.

Dr. J. C. Johnson, Atlanta, Ga., read a paper entitled "Hydrochloric Acid in Gastro-Intestinal Pathology," which was discussed by Drs. Elliott C. Prentiss, El Paso, Tex.; A. L. Levin, New Orleans, La.; J. W. Roberts, Atlanta, Ga.; Daniel N. Silverman, New Orleans, La., and in closing by the essayist.

Dr. John B. Fitts, Atlanta, Ga., read a paper entitled "Gastro-Intestinal Expressions of Sympathetico and Vagotonia," which was discussed by Drs. J. E. Knighton, Shreveport, La., and Sidney K. Simon, New Orleans, La.

Dr. Charles G. Lucas, Louisville, Ky., read a paper entitled "Diverticula of Esophagus," which was discussed by Drs. Irvin Abell, Louisville, Ky., and in closing by the essayist.

Under the title of "Relation and Discussion of Cases," Dr. Marvin H. Smith, Jacksonville, Fla., spoke on the subject "Early Diagnosis and, Therefore, Early Treatment of Cases of Cancer."

Dr. J. L. Jelks, Memphis, Tenn., reported a case of "Adenometa of the Rectum and Sigmoid." Laboratory report was non-malignant. X-ray examination of the chest showed the mediastinum and both lungs filled with metastatic process. Patient died of acute lobar pneumonia. Autopsy refused.

Dr. A. L. Levin, New Orleans, La., reported a case of supposed gastric carcinoma which proved to be systemic lues.

The Association adjourned and went into executive session.

The following officers were elected:

President: Dr. Marvin H. Smith, Jacksonville, Fla.
Vice-President: Dr. Julius Friedenwald, Baltimore, Md.
Secretary: Dr. J. B. Fitts, Atlanta, Ga.

SECTION ON RADIOLOGY

Officers

Chairman—Dr. O. H. McCandless, Kansas City, Mo.
Vice-Chairman—Dr. T. A. Groover, Washington, D. C.
Secretary—Dr. J. T. McKinney, Roanoke, Va.

Monday, November 14, 9:30 a. m.

The Section met in Room B, Eastman Hotel, Hot Springs, Ark., and was called to order by the Chairman.

The Chairman appointed a Nominating Committee consisting of Drs. R. H. Lafferty, Charlotte, N. C.; C. O. Donaldson, Kansas City, Mo., and W. L. Lawrence, Memphis, Tenn.

A communication from Dr. W. A. Mulherin pointing out the advantages to be derived from all sections of this Association meeting in half day sessions was read. A resolution requesting the Council to adopt this plan was read and passed by the Section. (See report of Council for text of resolution.)

Dr. O. H. McCandless, Kansas City, Mo., then read his Chairman's Address entitled "Our Problems."

Dr. F. H. Clark, Oklahoma City, Okla., read a paper entitled "The X-Ray in Diagnosis of Gastro-Intestinal Disorders," which was discussed by Drs. Charles L. Martin, Dallas, Tex.; Robert H. Lafferty, Charlotte, N. C.; Douglas VanderHoof, Richmond, Va.; Russell Carman, Rochester, Minn., and in closing by the essayist.

Dr. J. Paul Keith, Louisville, Ky., read a paper entitled "Syphilis of the Colon," which was discussed by Drs. A. L.

Gray, Richmond, Va.; Charles H. Nims, Hot Springs, Ark.; Allan Eustis, New Orleans, La.; John D. MacRae, Asheville, N. C.; Charles L. Martin, Dallas, Tex.; James J. Clark, Atlanta, Ga.; B. W. Fontaine, Memphis, Tenn.; M. M. Roland, Oklahoma City, Okla., and in closing by the essayist.

Dr. Russell Carman, Rochester, Minn., read a paper entitled "The Roentgen Diagnosis of Cancer of the Stomach" (Lantern Slides), which was discussed by Drs. A. L. Gray, Richmond, Va.; Allan Eustis, New Orleans, La.; H. A. M. Simpson, Florence, Ala.; James J. Clark, Atlanta, Ga., and in closing by the essayist.

Dr. John D. MacRae, Asheville, N. C., read a paper entitled "Roentgen Diagnosis of Pulmonary Tuberculosis," which was discussed by Drs. I. S. Kahn, San Antonio, Tex.; Russell Carman, Rochester, Minn.; A. L. Gray, Richmond, Va., and in closing by the essayist.

Section adjourned until 2:00 p. m.

Monday, November 14, 2:00 p. m.

The Section was called to order by the Chairman.

Dr. A. L. Gray, Richmond, Va., read a paper entitled "Some Points in the Physics and Technic of Roentgen Ray Work," which was discussed by Drs. Charles L. Martin, Dallas, Tex.; W. L. Lawrence, Memphis, Tenn., and in closing by the essayist.

Dr. Robert H. Lafferty, Charlotte, N. C., read a paper entitled "Radiology or Surgery in the Diseased Tonsil," which was discussed by Drs. C. O. Donaldson, Kansas City, Mo.; Charles L. Martin, Dallas, Tex.; J. P. Keith, Louisville, Ky.; James J. Clark, Atlanta, Ga.; L. B. McBrayer, Sanatorium, N. C.; W. L. Lawrence, Memphis, Tenn.; A. L. Blesh, Oklahoma City, Okla.; H. P. Kuhn, Kansas City, Mo.; C. H. Ball, Tulsa, Okla., and in closing by the essayist.

Drs. C. O. Donaldson and G. E. Knappenberger, Kansas City, Mo., presented a paper entitled "Radium in the Treatment of Uterine Cancer," which was discussed by Drs. E. C. Ernst, St. Louis, Mo.; William Neill, Jr., Baltimore, Md.; Charles L. Martin, Dallas, Tex., and in closing by Dr. Donaldson.

Dr. Thomas A. Groover, Washington, D. C., read a paper entitled "Observations on the Use of Copper Filters in the Roentgen Treatment of Deep-Seated Malignancies."

Dr. Robert H. Millwee, Dallas, Tex., read a paper entitled "European Impressions and Recent Experiences in the Use of Deep Filtered Radiation."

Dr. E. C. Ernst, St. Louis, Mo., read a paper entitled "Practical Status of Deep Therapy in Malignancy with the Advent of Higher X-Ray Intensities."

Papers of Drs. Groover, Millwee and Ernst were discussed jointly by Drs. W. L. Lawrence, Memphis, Tenn.; J. P. Keith, Louisville, Ky., and in closing by the essayists.

The Nominating Committee presented the following nominations for officers of the Section, these nominees being unanimously elected:

Chairman: Dr. Thomas A. Groover, Washington, D. C.
Vice-Chairman: Dr. Robert H. Millwee, Dallas, Tex.
Secretary: Dr. E. C. Ernst, St. Louis, Mo.

The Section adjourned to meet at 7:00 p. m. in joint session with Section on Medicine.

Monday, November 14, 7:00 p. m.

A joint session of the Section on Radiology and Section on Medicine was held in the private dining room of the Arlington Hotel. A plate dinner was served, after which Dr. Bryce W. Fontaine, Memphis, Tenn., Chairman of the Section on Medicine, called the meeting to order and introduced Dr. Kennon Dunham, Cincinnati, Ohio, who spoke on the subject "X-Ray Classification of Pulmonary Tuberculosis as Applied to Prognosis and Treatment," illustrated by lantern slides.

Dr. Louis V. Hamman, Baltimore, Md., followed with a paper on "Pulmonary Tuberculosis," after which the joint session adjourned.

SECTION ON SURGERY

Officers

Chairman—Dr. John R. Caulk, St. Louis, Mo.
Vice-Chairman—Dr. A. L. Blesh, Oklahoma City, Okla.
Secretary—Dr. Hugh H. Trout, Roanoke, Va.

Tuesday, November 15, 2:00 p. m.

The Section met in the Elks Hall, Hot Springs, Ark., and was called to order by the Chairman.

The Secretary read a communication from Dr. W. A. Mulherin pointing out the advantages to be derived from all sections of this Association meeting in half day sessions. A resolution requesting the Council to adopt this plan was read and passed by the section. (See report of Council for text of resolution.)

Dr. Marvin E. Stout, Oklahoma City, Okla., read a paper entitled "The Undescended Testicle," which was discussed by Drs. Victor D. Lespinasse, Chicago, Ill.; LeRoy Long, Oklahoma City, Okla.; A. L. Blesh, Oklahoma City, Okla.; John R. Caulk, St. Louis, Mo., and in closing by the essayist.

Dr. E. L. Yeakel and Dr. F. L. Carson, Shawnee, Okla., presented a paper entitled "Some Observations on Prostatic Surgery," which was discussed by Drs. A. L. Blesh, Oklahoma City, Okla.; J. A. Crisler, Memphis, Tenn.; Irvin Abell, Louisville, Ky., and in closing by Dr. Yeakel.

Dr. W. W. Grant, Denver, Colo., read a paper entitled "Exstrophy of the Bladder," which was discussed by Dr. A. I. Folsom, Dallas, Tex., and in closing by the essayist.

Dr. William T. Black, Memphis, Tenn., presented a paper entitled "Retrodisplacement of the Uterus and Suggestions Regarding Their Proper Treatment," which was discussed by Drs. Lucius E. Burch, Nashville, Tenn.; William H. Vogt, St. Louis, Mo.; J. Hugh Carter, Memphis, Tenn.; A. L. Blesh, Oklahoma City, Okla.; J. A. Crisler, Memphis, Tenn.; E. T. Newell, Chattanooga, Tenn., and in closing by the essayist.

Dr. G. A. Hendon, Louisville, Ky., read a paper entitled "Acute Intestinal Obstructions," which was discussed by Drs. J. W. Barksdale, Winona, Miss.; John Darrington, Yazoo City, Miss.; LeRoy Long, Oklahoma City, Okla.; J. Shelton Horsley, Richmond, Va.; John L. Jelks, Memphis, Tenn.; W. W. Grant, Denver, Colo.; C. S. Pettus, Little Rock, Ark., and in closing by the essayist.

Dr. W. A. Bryan, Nashville, Tenn., read a paper entitled "The Relative Value of Operations on the Bile Passages," which was discussed by Drs. J. Shelton Horsley, Richmond, Va.; Isidore Cohn, New Orleans, La.; E. Denegre Martin, New Orleans, La.; A. L. Blesh, Oklahoma City, Okla.; Irvin Abell, Louisville, Ky.; Hugh H. Trout, Roanoke, Va.; J. W. Phillips, Oilton, Okla., and in closing by the essayist.

The Section adjourned until 9:30 a. m. Wednesday.

Wednesday, November 16, 9:30 a. m.

The Section was called to order by the Chairman.

Dr. Louis Frank, Louisville, Ky., read a paper entitled "Radium in Carcinoma of the Uterus, with Some End Results."

Dr. E. S. Lain and Dr. M. M. Roland, Oklahoma City, Okla., presented a paper entitled "Present Status of Radium Therapy."

Papers of Dr. Frank and Drs. Lain and Roland were discussed by Drs. William Neill, Baltimore, Md.; Clyde O. Donaldson, Kansas City, Mo.; W. S. Anderson, Memphis, Tenn.; Frank K. Boland, Atlanta, Ga.; Irvin Abell, Louisville, Ky.; J. Shelton Horsley, Richmond, Va.; A. J. Crowell, Charlotte, N. C.; E. Denegre Martin, New Orleans, La., and in closing by the essayists.

Dr. J. Shelton Horsley, Richmond, Va., read a paper entitled "Operations for Deformities Following Noma," which was discussed by Drs. Isidore Cohn, New Orleans, La.; W. A. Bryan, Nashville, Tenn.; C. W. Dixon, Douglas, Ark.; A. L. Blesh, Oklahoma City, Okla.; LeRoy Long, Oklahoma City, Okla., and in closing by the essayist.

Dr. John R. Caulk, St. Louis, Mo., read his Chairman's Address entitled "Differential Diagnosis Between Kidney and Intra-Abdominal Lesions."

Dr. H. G. Sloan, Cleveland, Ohio, read a paper entitled "The Solution of the Endemic Goiter Problem."

Dr. Jere L. Crook proposed a vote of thanks to Dr. Sloan for his splendid paper presented in such an admirable way. Seconded and carried unanimously by a rising vote.

The Chairman appointed the following as a Nominating Committee: Drs. Isidore Cohn, New Orleans, La.; John H. Blackburn, Bowling Green, Ky., and Jere L. Crook, Jackson, Tenn.

The Section adjourned until 2:00 p. m.

Wednesday, November 16, 2:00 p. m.

The Section was called to order by the Vice-Chairman.

Dr. Frank K. Boland, Atlanta, Ga., read a paper entitled "Crawford W. Long, the Discoverer of Anesthesia."

The following resolution was then introduced and passed:

Whereas, Unmistakable proofs show that Crawford W. Long used sulphuric ether to produce surgical anesthesia in Jefferson, Ga., on March 30, 1842; and,

Whereas, Undoubted records show that this was the first time in history that ether was ever used for this purpose; and,

Whereas, We are convinced that Dr. Long did everything in his power, with the facilities at hand, to publish his discovery to the world; be it

Resolved, That the Surgical Section of the Southern Medical Association, in session at Hot Springs, Ark., November 16, 1921, declares that Crawford W. Long, and none other, was the discoverer of anesthesia, and is entitled to the credit and honor for an achievement of such inestimable benefit to medicine and to humanity.

Be it resolved further, That the Southern Medical Association in general session is requested to adopt a resolution similar to this one; and that a committee, consisting of one member from each state represented in the Southern Medical Association, be appointed by the President of the Association to investigate the merits of all claimants to the honor of being the discoverer of anesthesia, giving the matter proper and careful attention, and report at our next annual meeting.

Dr. W. H. Goodwin, Charlottesville, Va., read a paper entitled "Remarks on the Surgery of the Gall-Bladder with an Analysis of Five Hundred Cases from the Surgical Clinic of the University of Virginia Hospital," which was discussed by Drs. J. Shelton Horsley, Richmond, Va.; W. A. Bryan, Nashville, Tenn.; H. G. Sloan, Cleveland, O.; LeRoy Long, Oklahoma City, Okla.; W. W. Grant, Denver, Colo.; Evarts Graham, St. Louis, Mo.; I. G. Duncan, Memphis, Tenn., and in closing by the essayist.

Dr. Ernest Sachs, St. Louis, Mo., read a paper entitled "Fracture of the Skull Considered from a Somewhat Different Point of View," which was discussed by Dr. LeRoy Long, Oklahoma City, Okla., and in closing by the essayist.

Dr. Irvin Abell and Dr. Stuart Graves, Louisville, Ky., presented a paper entitled "Study of Three Hundred Cases of Disease of the Breast," which was discussed by Dr. W. W. Crawford, Hattiesburg, Miss., and in closing by Dr. Abell.

Dr. Isidore Cohn presented the report of the Nominating Committee, which was as follows:

For Chairman: Dr. Hugh H. Trout, Roanoke, Va.
For Vice-Chairman: Dr. Irvin Abell, Louisville, Ky.
For Secretary: Dr. J. W. Barksdale, Winona, Miss.

On motion, seconded and carried, the Chairman was instructed to cast the unanimous ballot of the Section for these nominees.

Dr. John H. Blackburn called attention to the fact that some of the Sections of the Association had presented abstracts of their papers for publication in the program, and moved that the essayists of the Section on Surgery be required to supply a brief abstract of their papers at least thirty days prior to the meeting of the Section. Seconded by several members and carried.

Dr. Barney Brooks, St. Louis, Mo., read a paper entitled "An Experimental and Clinical Study of Bone Atrophy," which was discussed by Dr. J. Edgar Stewart, St. Louis, Mo., and in closing by the essayist.

Dr. Evarts Graham, St. Louis, Mo., read a paper entitled "Considerations of the Surgical Treatment of Bronchiectasis," which was discussed by Drs. J. J. Singer, St. Louis, Mo.; C. A. Hedblom, Rochester, Minn., and in closing by the essayist.

Dr. John Darrington, Yazoo City, Miss., read a paper entitled "The Urgent Need of a Law Requiring a Special License to Practice Surgery," which was discussed by Dr. J. W. Barksdale, Winona, Miss., and in closing by the essayist.

Dr. William H. Bailey, Oklahoma City, Okla., read a paper entitled "The Value of Blood Chemistry to the Surgeon," which was discussed by Dr. S. F. Hoge, Little Rock, Ark., and in closing by the essayist.

The Section adjourned sine die.

SOUTHERN STATES ASSOCIATION OF RAILWAY SURGEONS

Officers

President—Dr. D. Z. Dunott, Baltimore, Md.
Vice-President—Dr. Lucius E. Burch, Nashville, Tenn.
Secretary—Dr. J. W. Palmer, Ailey, Ga.

Monday, November 14, 9:30 a. m.

The Association met in the Elks Hall, Hot Springs, Ark., and was called to order by the Vice-President, Dr. Lucius E. Burch, who presided throughout the session in the absence of the President, Dr. D. Z. Dunott.

Dr. John H. Blackburn, Bowling Green, Ky., read a paper entitled "The Types of Injury Met by the Railroad Surgeons," which was discussed by Drs. Duncan Eve, Nashville, Tenn.; E. Denegre Martin, New Orleans, La.; Isidore Cohn, New Orleans, La., and in closing by the essayist.

Dr. E. Denegre Martin, New Orleans, La., read a paper entitled "Sacro-Iliac Dislocation," which was discussed by Drs. Thos. H. Hancock, Atlanta, Ga.; W. W. Harper, Selma, Ala.; J. A. Mitchell, Tullahoma, Tenn.; J. M. Burke, Petersburg, Va.; Duncan Eve, Nashville, Tenn.; John H. Blackburn, Bowling Green, Ky.; Isidore Cohn, New Orleans, La., and in closing by the essayist.

Dr. Joe P. Bowdoin, Adairsville, Ga., read a paper entitled "The Possibilities of Co-operation of Railroad Officials with Local and State Boards of Health in the Prevention of Diseases," which was discussed by Drs. E. Denegre Martin, New Orleans, La.; E. O. McDermott, Wilmot, Ark.; W. F. Smith, Little Rock, Ark., and in closing by the essayist.

Dr. W. W. Harper, Selma, Ala., read a paper entitled "Treatment of Fractures Near the Shoulder, Elbow and Wrist," which was discussed by Drs. E. T. Newell, Chattanooga, Tenn.; Thos. H. Hancock, Atlanta, Ga.; W. S. Anderson, Memphis, Tenn.; Isidore Cohn, New Orleans, La.; T. E. Abernathy, Chattanooga, Tenn.; W. H. Blake, Sheffield, Ala.; Duncan Eve, Nashville, Tenn., and in closing by the essayist.

Dr. J. A. Mitchell, Tullahoma, Tenn., read a paper entitled "Report of Three Cases of Gangrene of the Foot, with Amputation of Two of the Cases, the Remaining One Recovering Without an Operation."

Dr. W. H. Blake, Sheffield, Ala., read a paper entitled "The Conservative Treatment of Railway Injuries," which was discussed by Drs. E. Denegre Martin, New Orleans, La.; W. E. Vest, Huntington, W. Va.; E. T. Newell, Chattanooga, Tenn.; J. A. Mitchell, Tullahoma, Tenn., and in closing by the essayist.

The meeting adjourned until 2:00 p. m.

Monday, November 14, 2:00 p. m.

The meeting was called to order by the Vice-President.

The President's Address entitled "The Better Way" was read by Dr. Duncan Eve in the absence of the President, Dr. D. Z. Dunott, of Baltimore, Md. Dr. Eve also read to the Section a letter from Dr. Dunott.

Dr. Jos. M. Burke, Petersburg, Va., read a paper entitled "Traumatic Hernia," which was discussed by Drs. Thos. H. Hancock, Atlanta, Ga.; W. E. Vest, Huntington, W. Va.; Duncan Eve, Nashville, Tenn.; W. H. Blake, Sheffield, Ala.; J. A. Orr, Paris, Ky.; E. Denegre Martin, New Orleans, La., and in closing by the essayist.

Dr. J. R. Garner, Atlanta, Ga., read a paper entitled "Spinal Anesthesia," which was discussed by Dr. W. W. Harper, Selma, Ala., and in closing by the essayist.

Dr. Thos. H. Hancock, Atlanta, Ga., read a paper entitled "Amputations of the Leg," which was discussed by Drs. J. M. Burke, Petersburg, Va., and E. Denegre Martin, New Orleans, La.

Dr. Edward T. Newell, Chattanooga, Tenn., read a paper entitled "The Correlation of X-Ray Interpretations with Clinical Finding and Results in Railway Surgery" (with lantern slides), which was discussed by Drs. Chas. H. McCollum, Fort Worth, Tex.; W. E. Vest, Huntington, W. Va.; Thos. H. Hancock, Atlanta, Ga.; J. A. Orr, Paris, Ky.; E. Denegre Martin, New Orleans, La., and in closing by the essayist.

In the letter from President Dunott, which was read to the meeting, the suggestion was made that this Association appoint two members to act as affiliated members of the Section on Medicine and Surgery of the American Railway Association. Dr. Thos. H. Hancock, Atlanta, Ga., and Dr. W. A. Monroe, Sanford, N. C., were chosen to represent this Association as affiliated members.

The Association then proceeded with the election of officers for the ensuing year with the following result:

President: Dr. Lucius E. Burch, Nashville, Tenn.
Vice-President: Dr. W. W. Harper, Selma, Ala.
Secretary: Dr. J. W. Palmer, Ailey, Ga.

The Association adjourned sine die.

CONFERENCE OF CHIEF SURGEONS

Auxiliary of Southern States Association of Railway Surgeons

Officers

Chairman—Dr. Southgate Leigh, Norfolk, Va.
Secretary—Dr. Wm. Seagears (Deceased), St. Augustine, Florida.

Following the adjournment of the Southern States Association of Railway Surgeons the Chief Surgeons present went into conference.

In the absence of the Chairman, the Conference was called to order and presided over by Dr. Joseph M. Burke, Chief Surgeon, Seaboard Air Line, Petersburg, Va., he having been appointed Acting Chairman by Dr. L. E. Burch, President of the Southern States Association of Railway Surgeons. Dr. J. W. Palmer, Ailey, Ga., was appointed Acting Secretary.

In opening the Conference Dr. Burke requested all local surgeons to remain and if there was anything they wished the chief surgeons to take up they would be glad to hear from them.

Dr. Duncan Eve, who is a member of the Medical Section of the American Railway Association and who is familiar with every phase of the question of transportation for local surgeons over foreign lines, reported that this matter had so far advanced that it was his opinion that transportation will be granted local surgeons over foreign lines as was done under Government control.

A motion was carried requesting the Secretary of the Southern Medical Association to furnish the chief surgeons with reprints of a paper read by Dr. Joe P. Bowdoin before the Southern States Association of Railway Surgeons meeting entitled "The Possibilities of Co-operation of Railroad Officials with Local and State Boards of Health in the Prevention of Diseases."

There was some informal discussion of matters of interest.

The Conference then proceeded to the election of a Chairman and Secretary, the Acting Chairman, Dr. Joseph M. Burke, and the Acting Secretary, Dr. J. W. Palmer, being unanimously elected.

The Conference then adjourned until the next annual meeting of the Southern Medical Association.

SECTION ON UROLOGY

Officers

Chairman Dr A. J. Crowell, Charlotte, N. C.
Vice-Chairman Dr. E. G. Ballenger, Atlanta, Ga.
Secretary—Dr. J. C. Vinson, Tampa, Fla.

Monday, November 14, 9:30 a. m.

The Section on Urology met at the Mooreland, Hot Springs, Ark., and was called to order by the Secretary.

Dr. E. G. Ballenger read a communication from Dr. W. A. Mulherin pointing out the advantages to be derived from all sections of this Association meeting in half day sessions. A resolution requesting the Council to adopt this plan was read and passed by the Section. (See report of the Council for text of resolution.)

The Chairman read the following telegram from the Secretary of the Section: "Impossible for me to attend Hot Springs meeting. Have Thompson act as Secretary. Express my regrets. J. C. Vinson." Dr. Raymond Thompson then assumed the duties of the Secretary.

Dr. A. J. Crowell, Charlotte, N. C., read his Chairman's Address entitled "A Modification of Young's Perineal Prostatectomy."

Dr. Raymond Thompson, Charlotte, N. C., read a paper entitled "Prostatectomy: Pre- and Post-Operative Treatment," which was discussed by Drs. E. G. Ballenger, Atlanta, Ga.; George R. Livermore, Memphis, Tenn.; H. W. E. Walther, New Orleans, La.; G. F. Highsmith, Jr., Fayetteville, N. C.; John R. Caulk, St. Louis, Mo.; A. I. Folsom, Dallas, Tex.; J. H. Smith, Memphis, Tenn.; George A. Hendon, Louisville, Ky.; Abraham Nelken, New Orleans, La.; Louis Frank, Louisville, Ky.; J. L. Boogher, St. Louis, Mo., and in closing by the essayist.

Dr. H. W. E. Walther, New Orleans, La., read a paper entitled "Post-Operative Care of Surgical Conditions of the Kidney," which was discussed by Drs. George R. Livermore, Memphis, Tenn.; T. N. Black, Hot Springs, Ark.; Louis Frank, Louisville, Ky.; Victor D. Lespinasse, Chicago, Ill.; John R. Caulk, St. Louis, Mo., and in closing by the essayist.

Dr. Abraham Nelken, New Orleans, La., read a paper entitled "The Problem of Chronic Infection of the Prostate," which was discussed by Drs. J. T. Jelks, Hot Springs, Ark.; Claude G. Hoffman, Louisville, Ky.; Hardie R. Hayes, Jackson, Miss.; J. L. Morgan, Memphis, Tenn.; A. I. Folsom, Dallas, Tex.; H. W. E. Walther, New Orleans, La.; Miles A. Copeland, Birmingham, Ala.; H. K. Wade, Hot Springs, Ark.; I. G. Duncan, Memphis, Tenn.; Henry McClure Young, St. Louis, Mo.; T. N. Black, Hot Springs, Ark.; Victor D. Lespinasse, Chicago, Ill., and in closing by the essayist.

The Chairman appointed the following as a Nominating Committee: Dr. John R. Caulk, St. Louis, Mo., Chairman; Dr. George R. Livermore, Memphis, Tenn., and Dr. A. I. Folsom, Dallas, Tex.

The Section adjourned until 2:00 p. m.

Monday, November 14, 2:00 p. m.

The Section was called to order by the Chairman.

Dr. John T. Geraghty, Baltimore, Md., read a paper entitled "A Simple Method for the Surgical Removal of Vesical Diverticula," which was discussed by Drs. John R. Caulk, St. Louis, Mo.; A. J. Crowell, Charlotte, N. C., and in closing by the essayist.

Dr. A. I. Folsom, Dallas, Tex., read a paper entitled "Congenital Hydronephrosis, with Report of Two Cases Occurring in Children," which was discussed by Drs. George R. Livermore, Memphis, Tenn.; Abraham Nelken, New Orleans, La.; W. A. Frontz, Baltimore, Md., and in closing by the essayist.

Dr. Joseph H. Smith, Memphis, Tenn., read a paper entitled "Spina Bifida, with Diverticulum of the Bladder and Pyonephrosis," which was discussed by Drs. John R. Caulk, St. Louis, Mo.; J. L. Morgan, Memphis, Tenn.; George T. Tyler, Greenville, S. C., and in closing by the essayist.

Dr. Neil Moore, St. Louis, Mo., read a paper entitled "Some Observations on the Treatment of Gonococcal Arthritis in the Male," which was discussed by Drs. E. A. Purdue, Hot Springs, Ark.; H. H. Kramolowsky, St. Louis, Mo.; E. G. Ballenger, Atlanta, Ga.; I. G. Duncan, Memphis, Tenn.; J. Hugh Carter, Memphis, Tenn., and in closing by the essayist.

Dr. W. A. Frontz, Baltimore, Md., read a paper entitled "The More Frequent Causes of Urinary Obstruction in Male Children," which was discussed by Drs. A. J. Crowell, Charlotte, N. C.; H. W. E. Walther, New Orleans, La.; John T. Geraghty, Baltimore, Md., and in closing by the essayist.

Dr. George R. Livermore, Memphis, Tenn., presented "An Instrument for Removal of Ureteral Calculi," which was discussed by Drs. A. J. Crowell, Charlotte, N. C.; H. W. E. Walther, New Orleans, La.; E. G. Ballenger, Atlanta, Ga.; L. M. Campbell, Charleston, W. Va., and in closing by Dr. Livermore.

Dr. O. S. McCown, Memphis, Tenn., sent a message conveying his regret at his inability to attend the meeting and submitted his paper for publication.

Dr. John R. Caulk presented the following report for the Nominating Committee, these nominees being unanimously elected:

For Chairman: Dr. E. G. Ballenger, Atlanta, Ga.
For Vice-Chairman: Dr. H. W. E. Walther, New Orleans, La.
For Secretary: Dr. J. C. Vinson, Tampa, Fla.

Dr. John R. Caulk urged the members of the Section on Urology to remain over and attend the meetings of the Section on Surgery and take part in the discussions.

The Section adjourned sine die.

SECTION ON ORTHOPEDIC SURGERY

Officers

Chairman—Dr. Edward S. Hatch, New Orleans, La.
Vice-Chairman—Dr. W. Barnett Owen, Louisville, Ky.
Secretary—Dr. Willis Campbell, Memphis, Tenn.

Monday, November 14, 9:30 a. m.

The Section met in Room D, Eastman Hotel, Hot Springs, Ark., and was called to order by the Chairman.

Dr. John T. O'Ferrall, New Orleans, La., read a paper entitled "Diagnosis and Early Treatment of Bone Tuberculosis," which was discussed by Drs. Archer O'Reilly, St. Louis, Mo.; Willis Campbell, Memphis, Tenn.; F. W. Carruthers, Little Rock, Ark.; W. B. Owen, Louisville, Ky.; Earl D. McBride, Oklahoma City, Okla.; Edward S. Hatch, New Orleans, La., and in closing by the essayist.

Dr. Archer O'Reilly, St. Louis, Mo., read a paper entitled "X-Ray Study of Lumbo-Sacral Spine," which was discussed by Drs. F. W. Carruthers, Little Rock, Ark.; J. Spencer Davis, Dallas, Tex.; John T. O'Ferrall, New Orleans, La.; Robert T. Pirtle, Louisville, Ky.; Edward S. Hatch, New Orleans, La.; Willis Campbell, Memphis, Tenn.; Earl D. McBride, Oklahoma City, Okla.; Alphonso H. Meyer, Memphis, Tenn., and in closing by the essayist.

Dr. Edward S. Hatch, New Orleans, La., read his Chairman's Address entitled "The Limits of Orthopedic Surgery."

On motion of Dr. W. B. Owen, a vote of thanks was extended to Dr. Hatch for his instructive and interesting address.

The Chairman announced the following Nominating Committee: Drs. Robert T. Pirtle, John T. O'Ferrall, and F. W. Carruthers.

The Section adjourned until 2:00 p. m.

Monday, November 14, 2:00 p. m.

The Section was called to order by the Chairman.

Dr. E. W. Ryerson, Chicago, Ill., read a paper entitled "Operative Treatment of Certain Fractures."

Dr. W. B. Owen, Louisville, Ky., read a paper entitled "A Good Method of Treating Selected Fractures of Long Bones."

Dr. W. B. Carroll, Dallas, Tex., read a paper entitled "Treatment of Fractures of Long Bones."

Papers of Dr. Ryerson, Dr. Owen and Dr. Carroll were discussed jointly by Drs. Earl D. McBride, Oklahoma City, Okla.; John T. O'Ferrall, New Orleans, La.; F. W. Carruthers, Little Rock, Ark.; Robert T. Pirtle, Louisville, Ky.; George A. Hendon, Louisville, Ky.; Louis Frank, Louisville, Ky.; Henry G. Hill, Memphis, Tenn.; Isidore Cohn, New Orleans, La.; Willis Campbell, Memphis, Tenn., and in closing by the essayists.

Dr. J. S. Speed, Memphis, Tenn., read a paper entitled "Analysis of 160 Cases of Osteomyelitis with End Results," which was discussed by Drs. Henry G. Hill, Memphis, Tenn.; W. B. Carroll, Dallas, Tex.; Isidore Cohn, New Orleans, La., and in closing by the essayist.

Dr. John T. O'Ferrall, New Orleans, La., presented the report of the Nominating Committee, as follows.

For Chairman: Dr. W. B. Owen, Louisville, Ky.
For Vice-Chairman: Dr. Willis Campbell, Memphis, Tenn.
For Secretary: Dr. Fred G. Hodgson, Atlanta, Ga.

It was moved that the rules be suspended and that the nominees be elected by acclamation. Seconded and carried.

Dr. Owen, in accepting the Chairmanship of the Section, stated that the honor was unexpected. He felt a deep responsibility which the Section had conferred upon him, but with the able assistance of Dr. Campbell and Dr. Hodgson and with the co-operation of the membership of the Section, he felt they would have a good meeting next year.

The Section adjourned sine die.

SECTION ON OBSTETRICS

Officers

Chairman—George C. Mosher, Kansas City, Mo.
Vice-Chairman—Calvin R. Hannah, Dallas, Tex.
Secretary—James R. Garber, Birmingham, Ala.

Monday, November 14, 10:00 a. m.

The Section met in the Knights of Pythias Hall, Hot Springs, Ark., and was called to order by the Chairman, Dr. George Clark Mosher.

Dr. Geo. H. Lee, Galveston, Tex., read a paper entitled "Eclampsia and Pre-Eclamptic Conditions," which was discussed by Drs. Calvin R. Hannah, Dallas, Tex.; C. B. Reed, Chicago, Ill.; John T. Altman, Nashville, Tenn.; J. A. Hatchett, Oklahoma City, Okla.; Edw. Speidel, Louisville, Ky.; W. M. Biggs, Rome, Miss.; L. A. Yarbrough, Covington, Tenn.; W. A. Fowler, Oklahoma City, Okla.; Otto Schwarz, St. Louis, Mo.; H. M. Stucky, Sumter, S. C.; V. B. Cozby, Grand Saline, Tex.; A. P. Dowden, Eminence, Ky.; B. R. Beeler, Mineral Wells, Tex.; Geo. R. West, Chattanooga, Tenn.; J. O. Sanders, Anderson, S. C.; J. W. Ballew, Memphis, Tex.; W. H. Joyner, East Bernstadt, Ky.; Elizabeth Kane, Memphis, Tenn., and in closing by the essayist.

Dr. M. Y. Dabney, Birmingham, Ala., read a paper entitled "Sterility in Women," which was discussed by Drs. H. A. Davidson, Louisville, Ky.; Calvin R. Hannah, Dallas, Tex.; Edward Speidel, Louisville, Ky.; Geo. H. Lee, Galveston, Tex.; Otto Schwarz, St. Louis, Mo., and in closing by the essayist.

The Chairman announced the following Nominating Committee: Dr. Edward Speidel, Chairman; Dr. George H. Lee and Dr. Otto Schwarz.

The Section adjourned until 2:00 p. m.

Monday, November 14, 2:00 p. m.

The Section was called to order by the Chairman, Dr. George Clark Mosher, Kansas City, Mo., who read his Chairman's Address entitled "The Ideal Obstetrician."

Dr. Chas. B. Reed, Chicago, Ill., read a paper entitled "The Post-Mature Child."

Dr. W. H. Vogt, St. Louis, Mo., read a paper entitled "The Interruption of Pregnancy at Term with a Consideration of the Methods for Estimating the Maturity of the Fetus in Utero."

Papers of Drs. Reed and Vogt were discussed jointly by Drs. Otto Schwarz, St. Louis, Mo.; George C. Mosher, Kansas City, Mo.; Buford G. Hamilton, Kansas City, Mo.; Calvin R. Hannah, Dallas, Tex.; C. V. Rice, Muskogee, Okla.; Edward Speidel, Louisville, Ky.; David R. Neil, Nashville, Tenn.; Geo. F. Pendleton, Kansas City, Mo., and in closing by the essayists.

Dr. John T. Altman, Nashville, Tenn., read a paper entitled "The Treatment of Puerperal Fever," which was discussed by Drs. S. J. Gill, Roanoke, Va.; D. W. Kelly, Winnfield, La.; W. M. Biggs, Rome, Miss.; Otto Schwarz, St. Louis, Mo.; D. S. Downey, Chickasha, Okla.; W. H. Vogt, St. Louis, Mo.; Edward Speidel, Louisville, Ky.; W. A. Fowler, Oklahoma City, Okla.; Buford G. Hamilton, Kansas City, Mo., and in closing by the essayist.

Dr. W. A. Fowler, Oklahoma City, Okla., read a paper entitled "Some Frequently Violated Principles in Obstetrics," which was discussed by Drs. J. A. Hatchett, El Reno, Okla.; C. V. Rice, Muskogee, Okla.; Geo. C. Mosher, Kansas City, Mo.; David R. Neil, Nashville, Tenn.; H. L. Cockerham, Gunnison, Miss., and B. R. Beeler, Mineral Wells, Tex.

Dr. Ernest House, Ferris, Tex., read a paper entitled "The Revised Method of Twilight Sleep," which was discussed by Drs. F. B. King, Houston, Tex.; M. M. Smith, Dallas, Tex.; Otto Schwarz, St. Louis, Mo.; C. V. Rice, Muskogee, Okla.; Buford G. Hamilton, Kansas City, Mo.; W. H. Vogt, St. Louis, Mo., and in closing by the essayist.

The Nominating Committee presented the following nominations for officers of the Section and they were duly elected:

Chairman: Dr. Calvin R. Hannah, Dallas, Tex.
Vice-Chairman: Dr. J. T. Altman, Nashville, Tenn.
Secretary—Dr. James R. Garber, Birmingham, Ala.

The Section then adjourned sine die.

SECTION ON OPHTHALMOLOGY, RHINOLOGY, OTOLOGY AND LARYNGOLOGY

Officers

Chairman -Dr. W. T. Patton, New Orleans, La.
Vice-Chairman Dr. H. H. Briggs, Asheville, N. C.
Secretary—Dr. John J. Shea, Memphis, Tenn.

Tuesday, November 15, 2:00 p. m.

The Section met in Room B, Eastman Hotel, Hot Springs, Ark., and was called to order by the Chairman.

The Chairman read a communication from Dr. W. A. Mulherin pointing out the advantages to be derived from all sections of this Association meeting in half day sessions. A resolution requesting the Council to adopt this plan was read and passed by the Section. (See report of the Council for text of resolution.)

Dr. W. T. Patton, New Orleans, La., read his Chairman's Address entitled "Our Specialty and Internal Medicine."

Dr. L. W. Dean, Iowa City, Iowa, read a paper entitled "Para Nasal Sinus Disease in Young Children."

Dr. J. W. Murphy, Cincinnati, O., read a paper entitled "Infection of the Nasal Accessory Sinuses with Serious Meningeal Complications."

Papers of Dr. Dean and Dr. Murphy were discussed by Drs. T. W. Moore, Huntington, W. Va.; J. A. Stucky, Lexington, Ky.; John H. Foster, Houston, Tex.; H. H. Briggs, Asheville, N. C.; Martin E. Taber, Dallas, Tex., and in closing by the essayists.

Dr. A. O. Pfingst, Louisville, Ky., read a paper entitled "Some Observations with the Use of Metal Plates in the Advancement Operation," which was discussed by Drs. Charles A. Bahn, New Orleans, La.; Giles C. Savage, Nashville, Tenn.; H. H. Briggs, Asheville, N. C.; John Green, Jr., St. Louis, Mo., and in closing by the essayist.

Dr. John H. Foster, Houston, Tex., read a paper entitled "Some Observations on the Radical Mastoid Operation," which was discussed by Drs. O. H. King, Hot Springs, Ark.; Martin E. Taber, Dallas, Tex.; W. L. Simpson, Memphis, Tenn.; J. A. Stucky, Lexington, Ky.; Clarence De Weese, Lexington, Ky.; John F. Rowland, Hot Springs, Ark.; Robert Caldwell, Little Rock, Ark.; Leonard Keplinger, Waxahachie, Tex.; Homer Dupuy, New Orleans, La.; Eugene L. Myers, St. Louis, Mo., and in closing by the essayist.

Dr. Sidney Israel, Houston, Tex., made an announcement regarding a course of lectures to be given in Houston, beginning January 16, 1922.

The Chairman appointed as the Nominating Committee: Drs. John Green, Jr., J. A. Stucky and T. W. Moore.

Dr. R. H. T. Mann, Texarkana, Tex., read a paper entitled "The Relationship of the Aurist and Oculist to Group Medicine."

The Section adjourned until 9.30 a. m. Wednesday.

Wednesday, November 16, 9:30 a. m.

The Section was called to order by the Chairman.

Dr. E. H. Cary, Dallas, Tex., read a paper entitled "Further Study of Ocular Manifestations Resulting from Fifth Nerve Irritation" (Lantern Slides), which was discussed by Dr. J. A. Stucky, Lexington, Ky., and in closing by the essayist.

Dr. William Mullins, Colorado Springs, Colo., read a paper entitled "Tuberculous Laryngitis," which was discussed by Drs. J. A. Stucky, Lexington, Ky.; C. L. Minor, Asheville, N. C.; I. S. Kahn, San Antonio, Tex.; Benton N. Colver, Battle Creek, Mich.; Jacob J. Singer, St. Louis, Mo., and in closing by the essayist.

Dr. T. E. Carmody, Denver, Colo., read a paper entitled "The Increasing Importance of Peroral Endoscopy," which was discussed by Drs. Robert Caldwell, Little Rock, Ark.; C. L. Minor, Asheville, N. C.; W. L. Simpson, Memphis, Tenn.; Martin E. Taber, Dallas, Tex.; John T. Crebbin, New Orleans, La.; John H. Foster, Houston, Tex.; E. H. Cary, Dallas, Tex.; William W. Potter, Knoxville, Tenn.; Joseph Brown Farrior, Tampa, Fla.; W. T. Patton, New Orleans, La., and in closing by the essayist.

Dr. Greenfield Sluder, St. Louis, Mo., and Dr. L. W. Dean, Iowa City, Ia., reported observations on relief of pain at the base of the tongue by the injection of alcohol.

Dr. Greenfield Sluder presented an antrum forcep with locking blades.

Dr. Greenfield Sluder, St. Louis, Mo., read a paper entitled "Some Rhinological Experiences in Ophthalmology," which was discussed by Drs. L. W. Dean, Iowa City, Ia.; Eugene L. Myers, St. Louis, Mo.; E. H. Cary, Dallas, Tex.; John J. Shea, Memphis, Tenn., and in closing by the essayist.

The Section adjourned until 2:00 p. m.

Wednesday, November 16, 2:00 p. m.

The Section was called to order by the Chairman.

Dr. George E. Adkins, Jackson, Miss., read a paper entitled "Diphtheria and Hemolytic Streptococcus Carriers as Shown by Tonsil Section and Growth After Enucleation," which was discussed by Drs. Carl A. Weiss, Baton Rouge, La.; J. A. Stucky, Lexington, Ky.; William W. Potter, Knoxville, Tenn.; H. W. Lyman, St. Louis, Mo., and in closing by the essayist.

Dr. Sidney Israel, Houston, Tex., read a paper entitled "External Deformities of the Nose and Their Correction by the Intranasal Route," which was discussed by Drs. T. E. Carmody, Denver, Colo.; W. L. Simpson, Memphis, Tenn., and in closing by the essayist.

Dr. H. W. Lyman, St. Louis, Mo., read a paper entitled "Lung Abscess: Etiology."

Dr. C. L. Minor, Asheville, N. C., read a paper entitled "Lung Abscess: Clinical History."

Dr. C. O. Giese, Colorado Springs, Colo., read a paper entitled "Lung Abscess: Treatment."

The Symposium on Lung Abscess, papers of Dr. Lyman, Dr. Minor and Dr. Giese, was discussed by Drs. Louis V. Hamman, Baltimore, Md.; Homer Dupuy, New Orleans, La.; T. E. Carmody, Denver, Colo.; Paul H. Ringer, Asheville, N. C.; Lewis J. Moorman, Oklahoma City, Okla.; Charles H. Cocke, Asheville, N. C., and in closing by the essayists.

Dr. Homer Dupuy, New Orleans, La., read a paper entitled "Tracheal Bronchial Diphtheria," which was discussed by Drs. W. L. Simpson, Memphis, Tenn.; Carl A. Weiss, Baton Rouge, La.; H. W. Lyman, St. Louis, Mo., and in closing by the essayists.

Dr. Charles A. McWilliams, Gulfport, Miss., read a paper entitled "Climatic Influence in Infection of the Upper Respiratory Tract," which was discussed by Drs. John J. Shea, Memphis, Tenn.; H. W. Lyman, St. Louis, Mo.; J. A. Stucky, Lexington, Ky.; Eugene L. Myers, St. Louis, Mo., and in closing by the essayist.

Dr. J. A. Stucky, Lexington, Ky., made a verbal report for the Committee on Trachoma from this Section which has been working in conjunction with similar committees from other associations.

It was moved by Dr. Homer Dupuy that this report be accepted and the Committee asked to continue its work. Motion seconded and carried.

Section adjourned until 9:30 a. m. Thursday.

Thursday, November 17, 9:30 a. m.

The Section was called to order by the Chairman.

Dr. R. W. Ralston, Houston, Tex., read a paper entitled "Glaucoma Following Cataract Extraction," which was discussed by Drs. A. C. Lewis, Memphis, Tenn.; Chas. A. Bahn, New Orleans, La.; William F. Hardy, St. Louis, Mo.; J. A. Stucky, Lexington, Ky.; John H. Burleson, San Antonio, Tex.; John Green, Jr., St. Louis, Mo., and in closing by the essayist.

Dr. John Green, Jr., St. Louis, Mo., read a paper entitled "Cysts and Cystic Tumors of the Caruncle," which was discussed by Drs. Charles A. Bahn, New Orleans, La., and in closing by the essayist.

Dr. Harold Bailey, Springfield, Mo., read a paper entitled "Indications for Operation on the Middle Turbinate," which was discussed by Drs. George E. Adkins, Jackson, Miss.; John T. Crebbin, New Orleans, La.; Joseph Brown Farrior, Tampa, Fla.; Joseph B. Greene, Asheville, N. C.; A. C. Lewis, Memphis, Tenn.; H. H. Briggs, Asheville, N. C.; Benton N. Colver, Battle Creek, Mich.; Eugene L. Myers, St. Louis, Mo., and in closing by the essayist.

Dr. J. A. Stucky at this time called attention to the American Institute of Medicine, especially its work in ophthalmology and oto-laryngology, and urged the members to obtain the abstracts issued by this Institute.

It was moved by Dr. E. H. Cary, Dallas, Tex., that the Southern Medical Association, through its Publication Committee, be asked to look into the matter and try to correlate at as early a date as possible all of the papers that would constitute the Transactions of this Section and have them bound and placed at the disposal of the members of the Section. Motion seconded by Dr. John T. Crebbin and carried.

The Nominating Committee presented the following nominations for officers of the Section and they were duly elected:

For Chairman: Dr. H. H. Briggs, Asheville, N. C.
For Vice-Chairman: Dr. John H. Foster, Houston, Tex.
For Secretary: Dr. John J. Shea, Memphis, Tenn.

The newly elected Chairman, Dr. H. H. Briggs, took the chair.

It was suggested by Dr. W. T. Patton that it would be better to have a larger Program Committee, this work in the past having been done by the Secretary. On motion of Dr. O. M. Marchman, Dallas, Tex., duly seconded, the three officers of this Section were appointed members of the Program Committee.

The Section adjourned sine die.

SECTION ON PUBLIC HEALTH

Officers

Chairman—Dr. S. W. Welch, Montgomery, Ala.
Vice-Chairman—Dr. P. W. Covington, New Orleans, La.
Secretary—Dr. Henry Boswell, Sanatorium, Miss.

Tuesday, November 15, 2:00 p. m.

The Section met in the auditorium of the First Baptist Church, Hot Springs, Ark., and was called to order by the Chairman.

The session was opened with song and prayer, after which the Chairman appointed the following committees to report at the last session Thursday forenoon: Committee on Nominations: Dr. James A. Hayne, Columbia, S. C.; Dr. W. S. Leathers, Jackson, Miss., and Dr. L. B. McBrayer, Sanatorium, N. C. Committee on Resolutions: Dr. Henry Boswell, Sanatorium, Miss.; Dr. Ennion G. Williams, Richmond, Va., and Dr. F. J. Underwood, Jackson, Miss.

The Chairman presented to the Section the plan of Dr. Mulherin for half day sessions of the Association in presenting the scientific programs at the annual meetings and read a resolution requesting the Council to adopt this plan. After brief discussion this resolution was unanimously adopted by the Section. (See Council Report for text of resolution.)

Dr. S. W. Welch, State Health Officer, Montgomery, Ala., read his Chairman's Address entitled "Essentials of Successful Leadership for Public Health Work on a County Basis."

Dr. F. J. Underwood, Mississippi State Board of Health, Jackson, Miss., read a paper entitled "Organization and Work of Bureau of Child Welfare," which was discussed by Drs. Ennion G. Williams, Richmond, Va.; C. W. Garrison, Little Rock, Ark.; B. L. Wyman, Birmingham, Ala.; E. B. Wise, Chattanooga, Tenn.; L. B. McBrayer, Sanatorium, N. C.; P. E. Blackerby, Louisville, Ky.; J. P. Bow-

doin, Adairsville, Ga.; J. A. Hayne, Columbia, S. C., and in closing by the essayist.

Dr. J. Ross Snyder, Birmingham, Ala., read a paper entitled "Relation of Bacterial Count in Milk to Diseases in Children Consuming It," which was discussed by Drs. S. H. Welch, Birmingham, Ala.; L. B. McBrayer, Sanatorium, N. C., and Oscar Dowling, New Orleans, La.

Dr. C. W. Garrison, State Board of Health, Little Rock, Ark., read a paper entitled "Midwifery and Medical Legislation," which was discussed by Drs. Hardie R. Hays, Jackson, Miss.; J. S. Mitchener, Raleigh, N. C., and in closing by the essayist.

Dr. C. C. Pierce, Assistant Surgeon-General, U.S.P.H.S., Washington, D. C., read a paper entitled "Co-operative State and Federal Control of Venereal Infections," which was discussed by Drs. C. W. Garrison, Little Rock, Ark.; E. B. Wise, Chattanooga, Tenn.; J. S. Mitchener, Raleigh, N. C.; D. J. Williams, Gulfport, Miss.; G. H. Benton (Miami, Fla.), U.S.P.H.S., Gulfport, Miss.; Hardie R. Hays, Jackson, Miss.; Valeria Parker, U. S. Inter-departmental Hygiene Board, Washington, D. C., and in closing by the essayist.

The Section adjourned until 9:30 a. m. Wednesday.

Wednesday, November 16, 9:30 a. m.

The Section was called to order by the Chairman.

The Section then took up the Symposium on Pellagra, brief reports being presented from the following states:

Alabama—Dr. S. W. Welch, State Health Officer.
Arkansas—Dr. C. W. Garrison, State Health Officer.
Georgia—Dr. Joe P. Bowdoin, State Board of Health.
Kentucky—Dr. P. E. Blackerby, State Board of Health.
Louisiana—Dr. Oscar Dowling, State Health Officer.
Mississippi—Dr. W. S. Leathers, State Health Officer.
Missouri—Statistics sent by mail read by Dr. Ennion G. Williams.
North Carolina—Dr. J. S. Mitchener, State Board of Health.
Oklahoma—Statistics sent by mail read by Dr. Ennion G. Williams.
South Carolina—Dr. James A. Hayne, State Health Officer.
Tennessee—Dr. E. L. Bishop, State Board of Health.
Texas—Dr. Oscar Dowling for Dr. M. M. Carrick, State Health Officer.
Virginia—Dr. Ennion G. Williams, State Health Officer.

Dr. James A. Hayne, State Health Officer, Columbia, S. C., read a paper entitled "Pellagra and Why I Do Not Believe it Due to Food Deficiencies Alone."

Dr. W. E. Deeks, Medical Director, United Fruit Company, New York, N. Y., read a paper entitled "Unbalanced Diet Theory in Pellagra."

Dr. W. J. MacNeal, Forest Hills, N. Y., read a paper entitled "Infectious Theory of Pellagra."

Papers of Dr. Hayne, Dr. Deeks and Dr. MacNeal were discussed jointly by Col. Jos. T. Siler, U. S. Army, Washington, D. C.; Drs. W. S. Leathers, Jackson, Miss.; Seale Harris, Birmingham, Ala.; C. C. Bass, New Orleans, La.; John L. Jelks, Memphis, Tenn.; D. W. Kelly, Winnfield, La.; Geo. L. Echols, Milledgeville, Ga.; W. M. Biggs, Rome, Miss.; Clarence Pierson, Alexandria, La.; W. G. Somerville, Memphis, Tenn.; C. F. Williams, Columbia, S. C., and in closing by Drs. MacNeal and Deeks.

The Section adjourned until 2:00 p. m.

Wednesday, November 16, 2:00 p. m.

The Section was called to order by the Chairman.

Paper of Dr. A. T. McCormack, State Health Officer, Louisville, Ky., entitled "Methods of Getting People to Build Privies," was read by Dr. P. E. Blackerby, State Board of Health, Louisville, Ky., and was discussed by Dr. C. W. Garrison, Little Rock, Ark.; Dr. W. E. Deeks, New York, N. Y.; Mr. C. H. Kibbey, Tennessee Coal, Iron and Railroad Co., Birmingham, Ala., and in closing by Dr. Blackerby.

Paper of Dr. P. W. Covington, Louisina State Board of Health, New Orleans, La., entitled "Rural Health Work, Its Organization and Prosecution," was read by Dr. Henry Boswell in the absence of the essayist, and was discussed by Drs. A. P. Harrison, Austin, Tex.; Hardie R. Hays, Jackson, Miss.; F. J. Underwood, Jackson, Miss.; J. S. Mitchener, Raleigh, N. C.; E. B. Wise, Chattanooga, Tenn., and in closing by Dr. Boswell.

Dr. A. P. Harrison, Austin, Tex., read a paper entitled "Control of Typhoid in Rural Communities."

Dr. E. L. Bishop, Tennessee State Board of Health, Nashville, Tenn., read a paper entitled "Soil Pollution—the Public Health Problem of Today."

Dr. Ennion G. Williams, State Health Officer, Richmond, Va., read a paper entitled "'Unorganized County Problem and How Best Taken Care of; Malaria Control."

Papers of Dr. Harrison, Dr. Bishop and Dr. Williams were discussed jointly by Drs. J. A. Hayne, Columbia, S. C.; E. A. Hines, Seneca, S. C.; P. E. Blackerby, Louisville, Ky.; W. S. Leathers, Jackson, Miss.; C. H. Kibbey, Birmingham, Ala.; E. L. Bishop, Nashville, Tenn.; L. B. McBrayer, Sanatorium, N. C., and in closing by the essayists.

The Section adjourned until 9:30 a. m. Thursday.

Thursday, November 17, 9:30 a. m.

The Section was called to order by the Chairman.

Dr. C. C. Bass, New Orleans, La., read a paper entitled "Difficulties and Errors Before and After Anti-Malaria Campaigns," which was discussed by Dr. L. D. Fricks, U.S.P.H.S., Memphis, Tenn.; Mr. J. A. LePrince, U.S.P.H.S., Memphis, Tenn., and in closing by the essayist.

Mr. J. A. LePrince, Sanitary Engineer, U.S.P.H.S., Memphis, Tenn., read a paper entitled "Fish as an Anti-Mosquito Agency."

Mr. E. B. Johnson, Alabama State Board of Health, Montgomery, Ala., read a paper entitled "Efficient and Economic Distribution of Oil in the Prevention of Malaria."

Papers of Mr. LePrince and Mr. Johnson were discussed jointly by Dr. Samuel F. Hildebrand, Washington, D. C.; Dr. T. H. D. Griffitts, Norfolk, Va.; Mr. W. H. W. Komp, Camilla, Ga.; Mr. J. C. Carter, Montgomery, Ala.; Mr. George Parker, Jacksonville, Tex., and in closing by the essayists.

Dr. Henry Boswell, Sanatorium, Miss., read a paper entitled "Field Work on Tuberculosis," which was discussed by Drs. J. A. Hayne, Columbia, S. C.; D. J. Williams, Gulfport, Miss., and in closing by the essayist.

The Nominating Committee reported the following nominees for officers of the Section and they were unanimously elected:

Chairman: Dr. Ennion G. Williams, Richmond, Va.
Vice-Chairman: Dr. C. W. Garrison, Little Rock, Ark.
Secretary: Dr. Henry Boswell, Sanatorium, Miss.

Dr. C. W. Garrison, State Health Officer, Little Rock, Ark., introduced the following resolution, which was unanimously adopted:

Resolved, That the Chairman of the Section on Public Health appoint a committee of three in each state comprising this Association to investigate the status of midwifery in their respective states, said committees to hold a joint conference immediately prior to the next annual meeting and to report the findings of said joint conference to our next annual meeting.

Dr. W. S. Leathers, State Health Officer, Jackson, Miss., introduced the following resolution, which was unanimously adopted:

Resolved, That a campaign be conducted by the Secretary of the Section between now and our next annual session seeking to have the municipal and county boards of health in the states composing this Association to send their local health officers to our next annual meeting at the expense of said municipal or county board of health.

Dr. Oscar Dowling, State Health Officer, New Orleans, La., introduced the following resolution, which was unanimously adopted:

Resolved, That the Secretary be requested to write the pastor of the First Baptist Church of Hot Springs, Ark., and express the appreciation of the Section for the use of the church and the co-operation given; and also a note of apreciation to the local entertainment committee expressing thanks for their courtesies.

AMERICAN SOCIETY OF TROPICAL MEDICINE

Officers

President—Dr. John M. Swan, Rochester, N. Y.
Vice-President—Dr. Karl F. Meyer, San Francisco, Calif.
Vice-President—Dr. Victor G. Heiser, New York, N. Y.
Secretary—Dr. Sidney K. Simon, New Orleans, La.

Monday and Tuesday, November 14-15, 9:30 a. m.

The American Society of Tropical Medicine, meeting conjointly with the Southern Medical Association, met in Room C, Eastman Hotel, Hot Springs, Ark., and was called to order by the President, Dr. John M. Swan.

No report of the proceedings of this Society have been made available for our minutes.

NATIONAL MALARIA COMMITTEE (CONFERENCE ON MALARIA)

Acting as the Malaria Division of the Section on Public Health

Officers of the Committee

Chairman—Dr. W. S. Leathers, State Health Officer, Jackson, Miss.
Secretary—Dr. L. D. Fricks, Surgeon, U. S. Public Health Service, Memphis, Tenn.

Monday, November 14, 10:00 a. m.

The Conference was called to order by the Chairman, Dr. W. S. Leathers. The Chairman read a resolution providing that all sections of the Southern Medical Association would hold half day sessions at all future meetings. This resolution was discussed by Dr. S. W. Welch, State Health Officer of Alabama, and upon motion being made to that effect was unanimously approved by the Conference.

Dr. Oscar Dowling, State Health Officer of Louisiana, read a paper entitled "Necessity for and Methods of Securing Accurate Malaria Statistics in Demonstration Areas," which was discussed by Dr. K. F. Maxcy, U. S. Public Health Service, Memphis, Tenn.; Mr. Geo. Parker, International Health Board, Jacksonville, Tex.; Dr. D. J. Williams, County Health Officer of Harrison County, Gulfport, Miss.; Mr. Leslie Frank, Dallas, Tex.; Dr. L. D. Fricks, Surgeon, U. S. Public Health Service, Memphis, Tenn.; Dr. C. C. Bass, Tulane College of Medicine, New Orleans, La.; Mr. W. G. Stromquist, City Health Department, Memphis, Tenn., and Dr. H. R. Carter, Assistant Surgeon-General, U. S. Public Health Service, Washington, D. C.

Dr. C. W. Garrison, State Health Officer of Arkansas, read a paper entitled "Problems Encountered in Maintaining Urban Malaria Control," which was discussed by Mr. A. W. Fuchs, U. S. Public Health Service, Memphis, Tenn.; Dr. L. D. Fricks, U. S. Public Health Service, Memphis, Tenn.; Dr. E. B. Wise, Director of Health, Chattanooga, Tenn.; Mr. F. R. Shaw, U. S. Public Health Service, Lake Charles La.; Dr. H. R. Carter, Assistant Surgeon-General, U. S. Public Health Service, Washington, D. C.; Dr. E. G. Williams, State Health Officer of Virginia; Dr. D. J. Williams, County Health Officer, Gulfport, Miss.; Mr. E. B. Johnson, Alabama State Board of Health, Montgomery, Ala.; Mr. George Parker, International Health Board, Jacksonville, Tex.; Mr. J. A. LePrince, Senior Sanitary Engineer, U.S. Public Health Service, Memphis, Tenn., and in closing by Dr. C. W. Garrison, State Health Officer of Arkansas.

Dr. S. W. Welch, State Health Officer of Alabama, read a paper entitled "Direct and Indirect Advantages of Urban Malaria Control," which was discussed by Mr. E. H. Magoon, International Health Board, Groveton, Tex.; Mr. George Parker, International Health Board, Jacksonville, Tex.; Mr. E. B. Johnson, Alabama State Board of Health, Montgomery, Ala.; Mr. F. R. Shaw, U. S. Public Health Service, Lake Charles, La.; Dr. T. H. D. Griffitts, U. S. Public Health Service, Norfolk, Va., and Mr. J. A. LePrince, Senior Sanitary Engineer, U. S. Public Health Service, Memphis, Tenn.

Dr. E. G. Williams, State Health Officer of Virginia, read a paper entitled "Rural Malaria Control with the County as the Unit," which was discussed by Dr. S. W. Welch, State Health Officer of Alabama, Montgomery, Ala.; Dr. H. R. Carter, Assistant Surgeon-General, U. S. Public Health Service, Washington, D. C.; Dr. C. C. Bass, Tulane College of Medicine, New Orleans, La.; Dr. T. H. D. Griffitts, U. S. Public Health Service, Norfolk, Va., and Dr. C. P. Coogle, U. S. Public Health Service, Memphis, Tenn.

Conference adjourned until 2:00 p. m.

Monday, November 14, 2:00 p. m.

Dr. J. A. Hayne, State Health Officer of South Carolina, read a paper entitled "Importance of and Factors to Be Considered in Selecting New Towns for Malaria Control Demonstrations," which was discussed by Dr. L. D. Fricks, U. S. Public Health Service, Memphis, Tenn.; Mr. W. G. Stromquist, City Health Department, Memphis, Tenn.; Mr. J. A. LePrince, U. S. Public Health Service, Memphis, Tenn., and Dr. C. H. Kibbey, Tennessee Coal, Iron and Railroad Company, Fairfield, Ala.

Following the discussion of this paper the Conference went into executive session. The minutes of the last meeting at Louisville, Ky., were read and approved. The reports of the different sub-committees were received.

Assistant Surgeon-General H. R. Carter, U. S. Public Health Service, Washington, D. C., was elected Honorary Chairman and the other officers continued in their present positions until next meeting.

The Conference was then declared adjourned by the Chairman.

CONFERENCE OF MALARIA FIELD WORKERS

A Conference of Malaria Field Workers, engaged in Cooperative Malaria Control Operations, met conjointly with the Southern Medical Association, Hot Springs, Ark., Nov. 15-16-17. The program of this Conference was made up largely of papers by sanitary engineers and was well attended and a most helpful Conference. No report of the proceedings of this Conference has been made available for our minutes.

SOUTHERN HOSPITAL ASSOCIATION

Auxiliary of the Southern Medical Association

Officers

President—Dr. W. P. Harbin, Rome, Ga.
Vice-President—Dr. Beverley R. Tucker, Richmond, Va.
Secretary—Dr. Paul V. Anderson, Richmond, Va.

Monday, November 14, 10:00 a. m.

The Association met in the auditorium of the First Baptist Church, Hot Springs, Ark., and was called to order by the President, Dr. W. P. Harbin, Rome, Ga., who read his President's Address entitled "Some Observations on Group Practice."

Dr. Stewart R. Roberts, Atlanta, Ga., read a paper entitled "Association versus Isolation for Young Men in Private Practice."

Mr. J. B. Franklin, Superintendent of Baylor University Hospital, Dallas, Tex., read a paper entitled "The Closed Staff."

After the reading of these papers there was an informal discussion of the following questions:

"The Advantages and Disadvantages of Group Practice."
"Is it Essential for a Group to Control Its Hospital?"

This informal discussion was participated in by Drs. Stuart McGuire, Richmond, Va.; A. L. Blesh, Oklahoma City, Okla.; J. A. Stucky, Lexington, Ky.; A. W. Ralls, Gadsden, Ala.; E. A. Stevens, Mayfield, Ky.; E. B. Bradley, Lexington, Ky.; George Dock, St. Louis, Mo., and H. H. Trout, Roanoke, Va.

After considerable discussion as to how the Southern Hospital Association, functioning as the Hospital Section of the Southern Medical Association, should be organized, a motion was made that the Southern Hospital Association should be continued and that hospital superintendents in the South be invited to join and that an effort be made to get them to attend our next annual meeting.

The Association then proceeded with the election of officers for the next year with the following result:

President: Dr. Stewart R. Roberts, Atlanta, Ga.
Vice-President: Dr. Battle Malone, Memphis, Tenn.
Secretary: Mr. J. B. Franklin, Dallas, Tex.

The Association adjourned sine die.

CONFERENCE ON MEDICAL EDUCATION

Officers

Chairman—Dr. Douglas VanderHoof, Richmond, Va.
Vice-Chairman—Dr. Kenneth M. Lynch, Dallas, Tex.
Secretary—Dr. I. I. Lemann, New Orleans, La.

Monday, November 14, 2:00 p. m.

The Conference met in Room F, Eastman Hotel, Hot Springs, Ark., and was called to order by the Chairman, Dr. Douglas VanderHoof, Medical College of Virginia, Richmond, Va., who read his Chairman's Address entitled "The Teaching of Dentistry as Related to Medicine."

Dr. J. T. Halsey, Tulane University, New Orleans, La., read a paper entitled "Correlation of Medicine and Physiology."

Dr. M. L. Graves, University of Texas, Galveston, Tex., read a paper entitled "Correlation of Medicine and Bacteriology."

Dr. Kenneth M. Lynch, Dallas, Tex., read a paper entitled "Correlation of Pathology, Medicine and Surgery."

Dr. Frank K. Boland, Emory University, Atlanta, Ga., read a paper entitled "Correlation of Surgery and Physiology."

(The stenographer employed to report this session failed to show up, and the Secretary lost his memoranda of the names of those who discussed the above papers. Therefore, this information is not available for these minutes.)

The Conference adjourned until 8:00 p. m.

Monday, November 14, 8:00 p. m.

The Conference was called to order by the Chairman.

Dr. G. Canby Robinson, Baltimore, Md., read a paper entitled "The Use of Full-Time Men in Clinical Teaching."

Dr. George Dock, St. Louis, Mo., read a paper entitled "Full-Time Clinical Professorships."

Papers of Dr. Robinson and Dr. Dock were discussed jointly by Drs. J. T. Halsey, New Orleans, La.; M. L. Graves, Galveston, Tex.; Stewart R. Roberts, Atlanta, Ga.; W. McKim Marriott, St. Louis, Mo.; McIver Woody, Dallas, Tex.; I. I. Lemann, New Orleans, La., and in closing by the essayists.

The Conference then proceeded to the election of officers for the ensuing year with the following result:

Chairman—Dr. I. I. Lemann, New Orleans, La.
Vice-Chairman: Dr. M. L. Graves, Galveston, Tex.
Secretary: Dr. W. McKim Marriott, St. Louis, Mo.

The Conference adjourned sine die.

REGISTRATION

Hot Springs Meeting, Southern Medical Association, November 14-17, 1921

	No. Doctors	No. Ladies Accompanying Doctors
Alabama	47	16
Arkansas (outside of Hot Springs)	231	62
Hot Springs (Ark.)	81	
District of Columbia	9	1
Florida	14	3
Georgia	41	5
Kentucky	50	18
Louisiana	53	6
Maryland	9	1
Mississippi	56	7
Missouri	70	17
North Carolina	27	2
Oklahoma	68	19
South Carolina	11	1
Tennessee	156	39
Texas	98	24
Virginia	17	1
West Virginia	8	
Other states	28	13
Totals	1074	235
Sanitary Engineers	15	
Scientific Exhibits, Association Office, Etc.	24	
Commercial Exhibits	90	6
	1203	241
Ladies	241	
Grand total	1444	

These figures were compiled from the card registration. There are always quite a number of doctors attending the meeting who neglect to register at the Association headquarters. The number who attend such meetings and fail to register is variously estimated at from 10 to 15 per cent of the total registration. If we take 10 per cent as a fair estimate, adding that to the 1074 doctors registered, we have an apparent attendance of 1181 doctors and a grand total of 1551.

Southern Medical News

ALABAMA

Dr. Willena A. Peck, Montevallo, has been elected President of the Shelby County Medical Society.

Dr. W. C. Hackett, Toney, has been appointed to work with the State Board of Health and will act as assistant to Dr. Carl Grote, Madison County Health Officer.

Plans have been accepted for a new City Hospital to be erected in Tuscaloosa. It is understood the work will be started soon.

The Stabler Hospital, Greenville, was destroyed by fire December 2, in which three patients lost their lives.

Deaths

Dr. Reuben C. Binns, Crawfordsville, aged 67, died at the State Sanatorium for the Insane October 27.

Dr. James Alexander Agnes, Ethelsville, aged 70, died from cerebral hemorrhage October 11.

Dr. Jeff B. Haralson, Fort Payne, aged 54, died October 26.

ARKANSAS

The new hospital to be built at Fort Smith for the treatment of tuberculosis will cost $20,000. The hospital will accommodate twenty-four patients.

At the recent organization meeting of the Arkansas National Guard Association, held in Little Rock, Dr. J. R. Wayne, Little Rock, was chosen President.

Deaths

Dr. Jessie Marion Spikes, Swartz, aged 36, died November 13 from fracture of the skull, the result of an automobile accident near Pocahontas.

Dr. W. E. Bone, Brookland, aged 52, died November 29.

Dr. James Robert Gant, Fort Smith, aged 54, died November 12 after an illness of almost two years.

Dr. J. W. Fuller, Augusta, died in Little Rock November 24.

Dr. George Oscar Marsh, Prescott, aged 65, died November 16 from cerebral hemorrhage.

DISTRICT OF COLUMBIA

The following appointments have been made to the staff of the Tuberculosis Hospital in Washington: Dr. W. D. Tewksbury, Dr. John T. Thomas, Thomas A. Clayton, L. H. Reichelderfer, George Tully Vaughan, Charles W. Richardson and Reginald R. Walker.

Deaths

Dr. Herbert Woodworth Schwarts, Washington, aged 62, died October 28.

Dr. Bernard Hove Harrison, Washington, aged 52, died October 18.

Dr. Charles Christopher Byrne, Washington, aged 84, died November 12.

FLORIDA

The Florida Midland Medical Society were guests of the Pinellas County doctors at St. Petersburg Beach October 12. The following officers were elected: Dr. G. H. Edwards, Orlando, President; Dr. K. L. Cline, Vice-President, DeSoto County; Dr. J. C. Knight, Vice-President, Hillsboro County; Dr. L. Lambdin, Vice-President, Pinellas County; Dr. J. H. Coffee, Vice-President, Polk and Orange Counties jointly; Dr. H. M. Beardoll, Orlando, Secretary-Treasurer. Plant City was selected as the next meeting place.

It is understood that the City Hospital, Lake City, will be enlarged. The cost of same will be $70,000.

The Central Florida Medical Society was recently organized in Ocala. It was decided to try to incorporate members of the county medical societies in the Fifth and Eighth Councilor Districts of the State Medical Association; also all dentists in these districts who are members of the State Association who care to join. The following officers were elected: Dr. H. C. Dozier, Ocala, President; Dr. J. H. Walters, Marion County, Vice-President; Dr. M. H. DePass, Alachua County, Vice-President; Dr. H. S. Cherry, Sumter County, Vice-President; Dr. P. J. Hadson, Citrus County, Vice-President; Dr. R. D. Ferguson, Reddick, Secretary-Treasurer.

GEORGIA

The following officers have been elected for Randolph County Medical Society: Dr. J. C. Patterson, Cuthbert, President; Dr. F. M. Martin, Shellman, Vice-President; Dr. G. Y. Moore, Cuthbert, Secretary-Treasurer; Dr. F. D. Patterson, Cuthbert, Censor three years; Dr. E. C. McCurdy, Shellman, Censor two years; Dr. F. S. Rogers, Coleman, Censor one year.

Dr. Marcus F. Carson, Griffin, has been appointed a member of the State Board of Medical Examiners, to fill the vacancy caused by the recent death of Dr. Henry W. Terrell.

The Grady Hospital Annex, for the sick and wounded colored people of Atlanta and Fulton County, was recently formally opened. Included in the purchase of the Annex

by the City of Atlanta are 200 beds, a modern, well-equipped laboratory, a nurses' home and a clinic. The improvements cost the City more than $100,000.

Deaths

Dr. Henry Walker Terrell, LaGrange, aged 50, died November 24 from angina pectoris.

Dr. Stile H. Dunbar, Athens, aged 36, died October 12.

Dr. James G. Sterrs, Atlanta, aged 40, died from cerebral hemorrhage October 12.

Dr. John A. Moore, Folkston, aged 44, died November 10.

Dr. Charles Polhill McCall, Reidsville, aged 78, died at the home of his son at Sylvania October 16.

Dr. Milton Nathan Armstrong, Atlanta, aged 73, died November 6.

Dr. A. R. Jones, Lavonia, aged 58, died from chronic nephritis October 11.

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KENTUCKY

The National Health Exposition will be held in the Jefferson County Armory, Louisville, February 1-9, 1922. The Exposition will be under the direction of the United States Public Health Service, the State Board of Health and the Louisville Health Department. In conjunction with the Exposition the United States Public Health Service will hold an institute and the Kentucky City and County Health Officers will open their annual conference, also the Kentucky Public Health Association.

Funds are being solicited from citizens of St. Johns and Clinton County for the construction of the Clinton County Memorial Hospital. The quota for St. Johns is $62,000, which will be met by $63,000 from the rest of the county.

Miss Sarah H. Vance,, Director of the State Board of Health's Bureau of Pure Foods and Drugs, was elected Vice-President of the Association of American Dairy, Food and Drug Officials at their recent meeting in Miami, Fla.

Dr. Harry S. Seiwelt, Kankakee, Ill., has succeeded Dr. W. W. Ray as Assistant Superintendent at the Eastern State Hospital for the Insane, Lexington.

Dr. Ethel Stuteville, Rockport, Ind., has been selected as Assistant Physician at the Western State Hospital, Hopkinsville. Dr. Stuteville succeeds Dr. Beynon, who resigned.

Dr. Frank Hamilton has formed a partnership with Dr. J. C. Mudd and on and after December 1 will be associated with the Lincoln Hospital, Bardstown.

Three new members have been added to the staff of the Illinois Central Railroad Hospital, Paducah, as follows: Dr. E. W. Jackson, Dr. C. E. Kidd and Dr. J. T. Reddick.

Dr. Walter Felix McCrocklin, Louisville, and Miss Alberta Mae Haller, were married November 19.

Dr. H. Prather Saunders, Hickman, and Miss Aileen Rooney, New York, N. Y., were married November 7.

Deaths

Dr. William Everett Sleet, Midway, aged 62, died from arteriosclerosis November 4.

Dr. Moses Roberts, Fincastle, aged 84, died September 21.

Dr. Harvey Louis Biggs, Olive Hill, aged 40, was shot and killed November 21.

Dr. John Henry Rompf, Louisville, aged 51, died November 10.

Dr. Herbert Bronner, Louisville, aged 42, died December 7.

Dr. Robert C. Hutchins, Berea, aged 83, died recently.

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LOUISIANA

An appropriation of $200,000 for the leper colony at Carville was included in the deficiency appropriation bill. This has passed the House and has been sent to the Senate for adoption.

A campaign has been started in New Orleans for the building of a tubercular hospital.

An addition to the Charity Hospital, New Orleans, soon to be erected will cost $100,000.

Dr. Stephen W. Stafford and Miss Marie Aurore Tircuit, both of New Orleans, were married November 24.

Dr. Mayo Toleman, of the Bureau of Municipal Research of New York, with the co-operation of Dr. John Callan, New Orleans, President of the Board of Health and other health officials, has begun a survey of the City Board of Health.

Deaths

Dr. Samuel Echols Hale, New Orleans, aged 71, died November 25.

Dr. William Sellers, Shreveport, aged 76, died November 25.

Dr. B. I. Paul, Cedar Grove, died October 30.

MARYLAND

Arrangements have been completed by Dr. C. Hampson Jones, Commissioner of Health, Baltimore City, for the establishment of a health center in the Walbrook district. A lease on a building has been made for a term of three years.

Dr. Walter L. Craig, Albany, N. Y., has been appointed Assistant Superintendent of the Johns Hopkins Hospital, Baltimore, succeeding Dr. Karl Van Norman, resigned.

An appropriation of $12,000 has been allowed the Health Commission for the creation of a Plague Division at the Baltimore City Health Department. The staff consists of eight experienced rat catchers and a laboratory force. The purpose of this division is to keep bubonic plague out of Baltimore.

A meeting of the Laennec Society of the Johns Hopkins Hospital, Baltimore, was held November 21. Dr. Louis V. Hamman is President.

New officers for the Baltimore City Medical Society have been elected as follows. Dr. Thomas B. Futcher, President; Dr. Alexius McGlannan, Vice-President; Dr. Frank Lynn, Secretary, re-elected, and Dr. Charles Emil Brack, Treasurer.

Dr. Benjamin Bruce Brumbaugh, Elkridge, and Miss Miriam Lee Smith, Baltimore, were married at Washington, D. C., November 5.

Dr. James Ernest Baylis, Major, M.C., U. S. Army, Baltimore, and Mrs. Mary T. Borger were married at East Islip, L. I., November 5.

Reorganization of the Medical Department of the Johns Hopkins Medical School has been completed and the new appointments are as follows: Dr. William S. McCann, Instructor of Medicine at Cornell University Medical School, New York, and Assistant Visiting Physician to Bellevue Hospital, has been chosen Associate in Medicine. In the Biologic Division, Dr. Alan M. Chesney has been appointed Associate Professor of Medicine, Dr. Arthur L. Bloomfield, Associate in Clinical Medicine, and Dr. Alfred B. Hodges, Assistant in Medicine. In the Division of Clinical Pathology, Dr. Walter A. Baetjer has been appointed Associate in Clinical Medicine and Dr. John G. Huck, Instructor in Medicine. In the General Division of the Department, Dr. Charles Sidney Burwell has been appointed Instructor in Medicine. The status of Dr. Lewellys F. Barker as Professor of Clinical Medicine remains unchanged.

Deaths

Dr. James Milton Spear, Cumberland, aged 78, died from heart disease November 17.

Dr. William S. Hitch, Pocomoke City, aged 82, died November 10.

Dr. Frank Paul, Baltimore, aged 34, died at the St. Agnes Hospital November 11.

Dr. Cary Breckenridge Gamble, Sr., Baltimore, aged 97, died at Gamble Hill from senility on November 8.

MISSISSIPPI

The county societies of Jones, Forrest, Covington, Greene and Perry have disbanded and the South Mississippi Medical Society has been organized. The officers are: Dr. J. D. Donald, Hattiesburg, President; Dr. Joseph S. Gatlin, Laurel, Vice-President; Dr. T. E. Ross, Jr., Hattiesburg, Secretary. The meeting places will alternate between Hattiesburg and Laurel, sessions to be held every three months.

A sanatorium near Jackson, to cost $1,000,000, is now under construction. The building will be finished by September, 1922.

The sum of $30,000 will be raised for the building of a new charity hospital at Vicksburg.

Dr. William O. Nelson, Lieutenant, M.C., U. S. Army, Baldwyn, and Miss Alma Holly, Booneville, were married October 23.

Deaths

Dr. Thomas Charles White, Jr., Bobo, aged 48, died at the Ivy Hospital, West Point, after a long illness, October 30.

Dr. Charles F. Carnes, Kosciusko, aged 66, died at the Baptist Memorial Hospital, Memphis, November 15 after a brief illness.

MISSOURI

Dr. Elizabeth Chaffee has been appointed Assistant to Dr. Marion O. Biggs, Chief of Staff of the Hospital for the Insane, Fulton.

The site of Madison County's Sanatorium for the treatment of tuberculosis is located one mile south of Edwardsville. On the property is a three-story house, which will be used as an administration building. The purchase price of the site was $40,000, and $300,000 will be spent.

The Frisco Railway System will build a new $200,000 hospital in Springfield.

(Continued on page 40)

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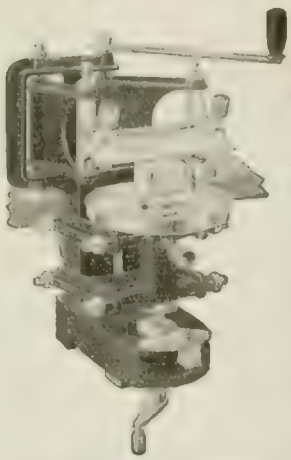

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(Continued from page 92)

It has been reported that since September 1 ninety-one have died from smallpox in Kansas City. Dr. James P. Leake, U. S. Public Health Service, Washington, D. C., has been sent to study the form of smallpox.

Jackson County Medical Society has elected the following officers: Dr. John G. Hayden, President; Dr. Clarence B. Francisco, Vice-President; Dr. William F. Kuhn, Treasurer; Dr. Sam H. Snider, Secretary.

Dr. Hermon S. Major, Assistant Physician at the State Hospital No. 1, Fulton, has resigned to become associated with Dr. J. Y. Simpson in conducting the Simpson-Major Sanitarium, Kansas City.

Deaths

Dr. William Porter, St. Louis, aged 69, died November 13 at Ocean Springs, Miss., from acute indigestion.

Dr. James R. Hufaker, Brookfield, aged 74, died suddenly November 15.

Dr. Louis E. Newman, St. Louis, aged 60, died November 18 from paresis.

Dr. Henry Lee Rothman, St. Louis, aged 32, died November 23 at the U. S. Public Health Service Hospital from meningitis.

Dr. R. N. Hanson, Springfield, aged 80, died recently as a result of injuries received when he was struck by an automobile.

NORTH CAROLINA

Dr. Alexander C. Bulla, Health Officer for Forsyth County, has been made Health Officer of the City of Raleigh and Wake County, succeeding Dr. Everett F. Long, who accepted the newly created position in the County Health Division of the State Board of Health. Dr. Long will install new health departments in the counties.

The Ninth District Medical Society has elected the following officers: Dr. George A. Ramsauer, China Grove, President; Dr. Minor R. Adams, Statesville, Vice-President; Dr. Isaac W. Taylor, Morganton, Secretary.

Building permits have been issued in Raleigh for a new dining hall and receiving building at the North Carolina State Hospital to cost $600,000. The receiving building will contain 150 rooms and will be a three-story structure.

A campaign for $25,000 has been conducted in Durham with which to complete the sum necessary for the construction of a $150,000 negro hospital. One citizen gave a sum of $75,000 on condition that it be met by city and county and the colored people.

(Continued on page 42)

Laboratories of

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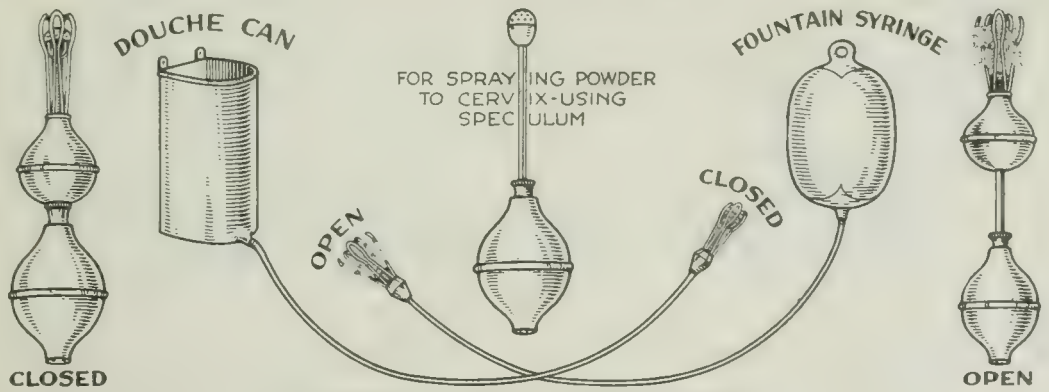

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(Continued from page 40)

The will of the late George W. Watts, West Durham, provides $200,000 for the Watts Hospital.

Plans are being prepared for a 20-room annex to the Mt. Airy Memorial Hospital.

The North Carolina Hospital for the Insane, Morganton, is overcrowded and notices have been sent out from the Hospital that no new patients can be accepted.

Dr. Leland Carson McIntosh, Henderson, and Miss Bessie Lee High, Campobello, S. C., were married November 3.

Deaths

Dr. Isaac M. Taylor, Morganton, aged 64, died November 26 from heart disease.

Dr. H. P. Underhill, Wendell, aged 44, died at Mary Elizabeth Hospital November 18.

Dr. John Luther McMillan, Red Springs, aged 66, died November 8 from heart disease.

Dr. Frank G. Wilson, Gastonia, aged 48, died November 13 from cerebral hemorrhage.

Dr. Allston David Horah, Salisbury, aged 57, died October 19 in the State Hospital for the Insane, Morganton.

Dr. John F. Sanderford, Creedmore, aged 57, died November 12 in the Watts Hospital, West Durham, from uremia.

OKLAHOMA

The Oklahoma State Nurses' Association met in Oklahoma City, October 14. Miss Olive Salmon, Oklahoma City, was elected President; Sister Mary Lucia, of St. Anthony's Hospital, was elected Secretary.

It has been announced that the Washington County Memorial Hospital, Bartlesville, will be ready for occupancy by January 1.

Dr. George Reed Tabor, Oklahoma City, and Miss Jessie Kirk Wainwright, Jackson, Miss., were married November 4.

Deaths

Dr. Henry F. Beckham, Roosevelt, aged 53, died November 9 from jaundice.

Dr. Robert Joseph Baze, Chickasha, aged 51, died November 14.

(Continued on page 44)

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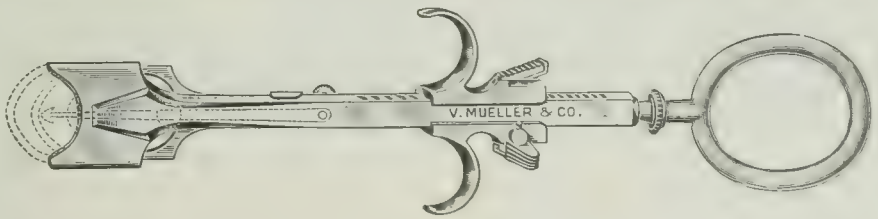

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(Continued from page 42)

Dr. Thomas Lee Chambliss, Hugo, aged 41, died October 15 after a lingering illness of many months.

SOUTH CAROLINA

A Public Health Institute will be held at Columbia some time in January.

The Thompson Memorial Building, of the Roper Hospital, Charleston, has been completed. This will be known as the Riverside Infirmary. The old building will be remodeled and used as a nurses' home.

A meeting of the Fifth District Medical Association was held in Winnsboro October 20. The following are officers of the Association: Dr. W. R. Wallace, President; Dr. G. W. Poovey and Dr. W. M. Love, Vice-President; Dr. G. A. Hennies, Secretary-Treasurer.

Williamsburg County Medical Society has elected the following officers: Dr. W. G. Gamble, President; Dr. E. T. Kelley, Vice-President; Dr. B. M. Montgomery, Secretary-Treasurer.

Deaths

Dr. Andrew Cornelius Baxter, aged 60, died November 4.

TENNESSEE

Dr. James R. Hudson, Alexandria, has been appointed a member of the Seventh District Pension Board at Liberty.

At a recent meeting of the Sullivan, Carter and Johnson Counties Medical Society the following officers were elected: Dr. J. O. Woods, Elizabethtown, President; Dr. B. A. Swift, Mountain City, Vice-President, from Johnson County; Dr. C. C. Hacker, Elizabethton, Vice-President, from Carter County; Dr. W. R. Booher, Bristol, Vice-President, from Sullivan County; Dr. W. K. Vance, Jr., Bristol, Secretary-Treasurer.

The Nurses' Home at the Baptist Memorial Hospital, Memphis, has been almost completed. The building is to cost $250,000. It will have 150 rooms, allowing a separate room for each student nurse except those in first-year training. A swimming pool, tennis courts and other recreational facilities will be provided.

(Continued on page 46)

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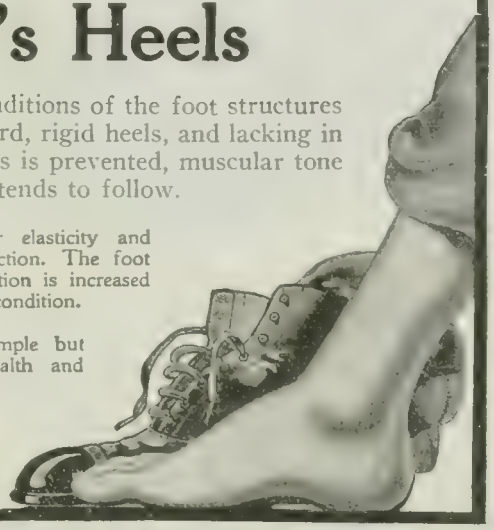

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(Continued from page 41)

Dr. O. E. Hampton, Atlanta, Ga., will fill the place as Examining Physician of the Veterans' Bureau, Jackson, succeeding Dr. James McClaran, resigned.

Dr. Otey J. Porter, Columbia, has been elected Commander of the Herbert Griffin Post of the American Legion. He served as Captain and Surgeon with the Medical Corps of the Army during the war.

The new Methodist Hospital, Memphis, was recently opened. The Hospital was erected at an approximate cost of $1,000,000, is six stories in height, and has a capacity of 225 beds. Dr. Battle Malone has charge of the Surgical Staff; Dr. J. B. McElroy heads the Medical Staff; Dr. Henry Hedden is Superintendent.

Dr. Joseph F. Hamilton, of Mississippi, has been appointed Assistant Director of the City Laboratory, of which Dr. William Krauss is Director.

Dr. H. H. Shoulders, Nashville, former executive officer of the State Board of Health, is to be commissioned a Major in the Medical Corps with supervision over the entire medical personnel of the Tennessee National Guard.

Dr. Charles Douglass Walton and Miss Louise Elizabeth Orr, both of Mount Pleasant, were married November 16.

Deaths

Dr. Charles J. Broyles, Johnson City, aged 49, died November 28.

Dr. S. L. Susong, Walland, aged 70, died November 9 from pneumonia.

Dr. James G. Butler, Shouns, aged 73, died November 2 from heart disease.

Dr. J. W. Huddleston, Lebanon, aged 89, died December 6.

Dr. David G. Curtis, Chattanooga, aged 86, died November 26.

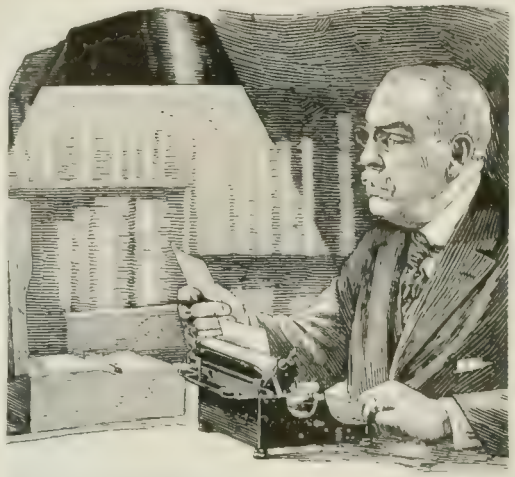
Dr. L. D. J. Ensor, Cookeville, aged 66, was found dead in bed November 18.

Dr. Obe F. Watlington, Jackson, aged 60, died suddenly November 19.

Dr. Robert W. Read, Murfreesboro, aged 69, died recently from pellagra.

Dr. Edward E. Kerr, Chattanooga, died December 14 at a local hospital after a few days' illness from hemorrhage of the stomach.

(Continued on page 48)



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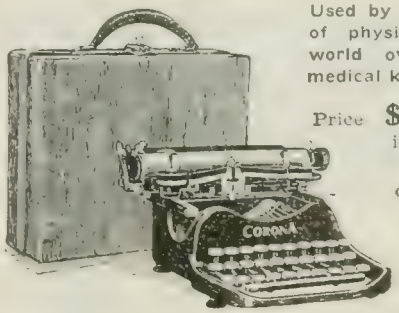

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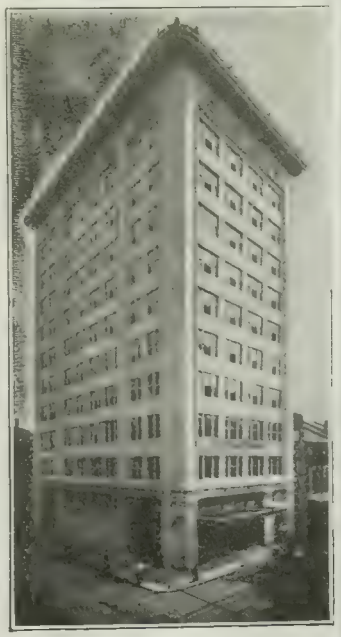

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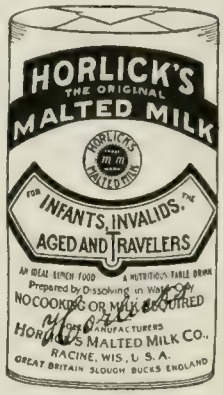

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(Continued from page 46)

TEXAS

At the recent meeting of the McKinney Medical and Surgical Society, held at McKinney, the following officers were elected: Dr. W. R. Mathers, President; Dr. J. E. Hunter, Vice-President; Dr. M. O. Perry, Secretary.

The Governor has appointed Dr. Zachary T. Scott, Austin, Dr. James W. McCarver, Brownwood, and Dr. William H. Hargis, San Antonio, as members of the Advisory Board of the American Legion Memorial Sanatorium, Kerrville. They are ex-service members of the Medical Corps.

An army construction hospital will be built at Jefferson Barracks at a cost of approximately $2,000,000.

Dr. John M. Holt, New York, N. Y., has charge of the management of the Emergency Hospital, Abilene.

The City Tuberculosis Hospital, Houston, has opened the new negro unit, which will accommodate twenty patients. This was erected at a cost of $10,000 out of funds contributed by the City of Houston and Harris County. Dr. A. E. Greer, the Hospital Director, will have charge of this unit.

Hopkins County Medical Society has elected the following officers: Dr. W. E. Connor, Cumby, President; Dr. S. B. Longino, Sulphur Springs, Vice-President; Dr. F. A. White, Sulphur Springs, re-elected Secretary-Treasurer.

The Fourth District Medical Society met in San Angelo November 28-29 and elected the following officers: Dr. J. W. Blasdell, Ballinger, President; Dr. Ned Snyder, Brownwood, Secretary-Treasurer. The next meeting will be held in Brownwood.

The contract has been awarded for the construction of the East Texas Hospital for the Insane at Rusk.

The Spohn Sanitarium, conducted by the Corpus Christi Sisters of Mercy, has received from the Corpus Christi Deep Water Port Project Committee $15,000 in notes of local firms received for relief work. The Sanitarium was destroyed in the storm of 1919, since which time its work has been conducted in a private dwelling. A subscription of $10,000 from Rt. Rev. Emanuel B. Ledvina, Bishop of the Diocese, and $35,000 raised in a drive will enable the sisters to start on the first unit of the building.

At a recent meeting of the Texas Surgical Society held in Fort Worth the following officers were elected: Dr. John T. Moore, Houston, President; Dr. Frank L. Barnes, Houston, First Vice-President; Dr. A. B. Small, Dallas, Second Vice-President; Dr. H. L. D. Kirkham, Houston, Secretary; Dr. J. B. Smoot, Dallas, Treasurer; Dr. W. B. Thorning, Houston, Recorder. The next meeting will be held in Galveston, April, 1922.

Plans and specifications for the new million dollar Medical Arts Building to be erected in Dallas by the Schneider estate have been turned over to the contractors for bids. The building will be devoted almost exclusively to doctors' offices.

The Tom Greene County Medical Society, at a recent meeting, elected the following officers: Dr. Harlan Horney, President; Dr. John R. Kight, Vice-President; Dr. H. K. Hinde, Secretary; Dr. W. W. Cobb, Treasurer; Dr. H. P. Rush, Censor.

Dr. Frederick S. Harrel, Olney, and Mrs. Sallye D. Harle, Malta, Mont., were married at Wichita Falls November 23.

Deaths

Dr. Thomas Jefferson Milner, Greenville, aged 77, died November 24 from pneumonia.

(Continued on page 50)

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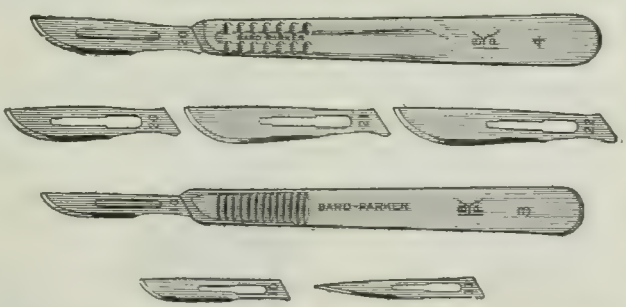

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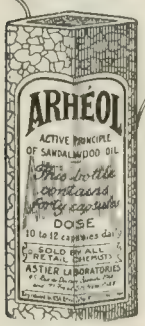

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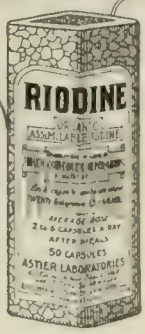

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(Continued from page 48)

Dr. John Martin Adams, Medina, aged 56, died November 21 at the Secor Sanatorium, Kerrville.

Dr. David W. Vest, Dallas, aged 62, died October 31 at a local sanatorium.

Dr. Banks I. Paul, Benford, aged 33, died October 31.

Dr. A. F. Upton, Coleman, aged 61, was accidentally shot and killed while on a hunting trip November 6.

Dr. Joseph G. Pettitt, Fannin, aged 70, died October 17 after a lingering illness.

Dr. William Lafayette Baber, Winnsboro, aged 48, died December 14 in St. Paul Sanitarium, Dallas, from nephritis.

VIRGINIA

The Southampton County Medical Society has elected the following officers for 1922: Dr. B. A. Pope, President; Drs. E. F. Reese and H. H. Foster, Vice-Presidents; Dr. R. L. Raiford, Secretary-Treasurer.

The Board of Directors of the Danville Anti-Tuberculosis League has let the contract for the construction of a modern sanatorium just outside of Danville.

The semi-annual meeting of the Southwestern Virginia Medical Society was held in Marion in September. The following officers were elected: Dr. A. B. Greiner, Rural Retreat, President; Dr. T. K. McKee, Saltville, Vice-President; Dr. E. G. Gill, Roanoke, re-elected Secretary-Treasurer. Pulaski was selected as the next place of meeting, May 11-12.

At a recent meeting of the Richmond Chapter, Military Order of the World War, Col. J. Fulmer Bright was elected Commander; Maj. G. A. Ezekiel, Adjutant, and [illegible] Richmond.

Dr. H. R. Fairfax has been appointed Health Officer of Bristol.

Dr. Oliver Curry Brunk, Richmond, and Miss Bernice Hall, Lynchburg, were married October 25.

Dr. Madison Redd Drewry and Miss Mary Anderson Starling, both of Cascade, were married October 12.

Dr. Allen Fiske Voshell, Charlottesville, and Miss Louise de Lancey Barclay, Baltimore, were married November 24.

Dr. Ira Cephas Riggin and Miss Ruth Elizabeth Bradshaw, both of Windsor, were married October 5.

Dr. Howard Russell Masters, Richmond, and Miss Bealmere Dare Linthicum, Fredericksburg, were married October 26.

Dr. Frank Carleton Thomas, Roanoke, and Miss Marjorie Winthrop Griffiss, Pikesville, Md., were married November 14.

Dr. Oliver Allison Ryder, Alexandria, and Miss Anne Elizabeth Potts, Portsmouth, were married October 8.

Dr. William Walton Rixey, Richmond, and Miss Helen Bradish, Charlottesville, were married at New York, N. Y., in October.

Deaths

Dr. William W. Dickie, Richmond, aged 87, died November 4 at the home of his daughter.

Dr. Daniel Castillo, Graham, aged 32, died October 22 at Luke's Hospital, Bluefield.

Dr. B. Lawrence Taliaferro, Catawba Sanatorium, aged 45, died November 21 at Roanoke.

WEST VIRGINIA

The West Virginia State Board of Control is making plans for improvements and additions to the Moundsville State Prison which will include a hospital for women prisoners.

Miss Jessie A. Clarke, R. N., has been appointed Superintendent of the Training School of the Ohio Valley General Hospital, Wheeling.

Dr. J. Ross Hunter, Huntington, has moved to Charleston and will be Surgeon-in-Charge of the Sheltering Arms Hospital at Hansford.

Dr. R. H. Powell, Fairmont, has been appointed Superintendent of State Hospital No. 3, at Fairmont, succeeding Dr. G. M. Ramage, resigned.

Wheeling Hospital, Wheeling, recently purchased property near the institution for a nurses' home. The three buildings on the property will be remodeled and used as nurses' residences.

Deaths

Dr. George Washington Tooley, Huntington, aged 62, died November 4 at a local hospital.

Dr. J. F. York, Kenova, died recently at Cincinnati, Ohio, from paralysis.

Dr. Cyrus F. Boyers, Fairmont, aged 79, died suddenly November 19.

Dr. Thomas Hallanan, Barboursville, aged 59, died October 15 after a brief illness.

Dr. D. W. Boone, Bellaire, aged 63, was recently found dead by his daughter, his death due probably to apoplexy.

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